Economic Growth

Transportation

A Study Team Report
to the Task Force on Program Review

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TRANSPORTATION PROGRAMS

A STUDY TEAM REPORT
TO THE TASK FORCE
ON PROGRAM REVIEW

SEPTEMBER 1985

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FOREWORD

The Task Force on Program Review was created in September 1984 with two major objectives - better service to the public and improved management of government programs. Recognizing the desirability of involving the private sector in the work of program review, assistance from national labour, business and professional organizations was sought. The response was immediate and generous. Each of these national organizations selected one of their members to serve in an advisory capacity. These public spirited citizens served without remuneration. Thus was formed the Private Sector Advisory Committee which has been responsible for reviewing and examining all of the work of program review.

The specific program reviews have been carried out by mixed study teams composed of a balance of private sector and public sector specialists, including representatives from provincial and municipal governments. Each study team was responsible for the review of a "family" of programs and it is the reports of these study teams that are published in this series. These study team reports represent consensus, including that of the Private Sector Advisory Committee, but not necessarily unanimity among study team members, or members of the Private Sector Advisory Committee, in all respects.

The review is unique in Canadian history. Never before has there been such broad representation from outside government in such a wide-ranging examination of government programs. The release of the work of the mixed study teams is a public acknowledgement of their extraordinarily valuable contribution to this difficult task.

Study teams reviewed existing evaluations and other available analyses and consulted with many hundreds of people and organizations. The teams split into smaller groups and consulted with interested persons in the private sector. There were also discussions with program recipients, provincial and municipal governments at all levels, from officials to cabinet ministers. Twenty provincial officials including three deputy ministers were members of various study teams.

The observations and options presented in these reports were made by the study teams. Some are subjective. That was necessary and appropriate considering that the review phase of the process was designed to be completed in a little more than a year. Each study team was given three months to carry out its work and to report. The urgent need for better and more responsive government required a fresh analysis of broad scope within a reasonable time frame.

There were several distinct stages in the review process. Terms of reference were drawn up for each study team. Study team leaders and members were appointed with assistance from the Private Sector Advisory Committee and the two Task Force Advisors: Mr. Darcy McKeough and Dr. Peter Meyboom. Mr. McKeough, a business leader and former Ontario cabinet minister, provided private sector liaison while Dr. Meyboom, a senior Treasury Board official, was responsible for liaison with the public sector. The private sector members of the study teams served without remuneration save for a nominal per diem where labour representatives were involved.

After completing their work, the study teams discussed their reports with the Private Sector Advisory Committee. Subsequently, their findings were submitted to the Task Force led by the Deputy Prime Minister, the Honourable Erik Nielsen. The other members are the Honourable Michael Wilson, Minister of Finance, the Honourable John Crosbie, Minister of Justice, and the President of the Treasury Board, the Honourable Robert de Cotret.

The study team reports represent the first orderly step toward cabinet discussion. These reports outline options as seen by the respective study teams and present them in the form of recommendations to the Task Force for consideration. The reports of the study teams do not represent government policy nor are they decisions of the government. The reports provide the basis for discussion of the wide array of programs which exist throughout government. They provide government with a valuable tool in the decision-making process.

Taken together, these volumes illustrate the magnitude and character of the current array of government programs and present options either to change the nature of these programs or to improve their management. Some decisions were announced with the May budget speech, and some subsequently. As the Minister of Finance noted in the May budget speech, the time horizon for implementation of some measures is the end of the decade. Cabinet will judge the pace and extent of such change.

These study team reports are being released in the hope that they will help Canadians understand better the complexity of the issues involved and some of the optional solutions. They are also released with sincere acknowledgement to all of those who have given so generously of their time and talent to make this review possible.

TERMS OF REFERENCE

SCOPE

There are 126 programs listed in Annex A directed in whole or in part to the transportation sector. In total, these programs involve some 24,000 person-years, $3.5 billion in capital, operating and maintenance expenditures, $1 billion in grants and contributions, and 11 departments and agencies. As well, some of these programs generate substantial federal revenues the total of which is estimated at $660 million.

The study team will examine the appended list with a view to making any necessary additions, modifications or deletions, and will structure its examination of the final list so as to focus on programs providing for the:

- transportation of passengers and goods safely;
- investigation of accidents;
- operations related to air and marine search and rescue;
- construction, operation and maintenance of infrastructure and services for the national transportation system;
- subsidization of services and elements of the national transportation system;
- provision of transportation infrastructure;
- provision of transportation related services; and
- subsidization of transportation-related services.

Special attention will be given to programs that involve mixed delivery, e.g. programs that are partly funded by the federal government and partly by other levels of government.

EXTERNAL ELEMENTS

The recently tabled budget makes reference to substantial reductions in transportation expenditures: $75 million in 1985/86, and $200 million in 1986/87 of which $100 million must be found within the Department of Transport.

Unless specifically directed by the Task Force, the study team will not address Air Canada and Via Rail except to the extent that they are dependent on the aforementioned services.

PURPOSE

Based on an appropriately modified list, the Ministerial Task Force on Program Review will be provided with advice and conclusions leading to government transportation programs which have clearly defined objectives consistent with the mandate of the federal government; programs which are better formulated, more efficient, more cost effective, and more responsive to their clientele; and programs for which decision-making is decentralized so far as possible to those in direct contact with client groups. Included in this advice could be observations concerning:

- areas of duplication between the federal and provincial governments as well as possible improvements to federal/provincial communications and program coordination;
- programs that could be eliminated;
- programs that could be consolidated;
- programs that have sound objectives but would benefit from a change in form;
- programs or parts of programs that could be candidates for transfer to other levels of government;
- programs or parts of programs that could be candidates for transfer to the private sector;
- a summary overview of the legislation that would be required to implement any of these program changes; and
- an overview of the resource implications of any recommended program changes, including increased costs or savings, and the number and location of either increases or decreases in staff.

PROCESS

By means of background information to support its conclusions, the study team will endeavour to obtain answers to three sets of questions and concerns with respect to basis and beneficiaries; efficiency and overlap; and gaps and omissions.

additional recommendations seem warranted, the rationale for the study team's recommendations will be fully explained and, where possible, supplementary comments by the other study team leader will be included.

LINKAGE WITH CONSULTATION PAPER

The Minister of Transport has publicly announced his intention to issue a paper by the end of June 1985 on a new National Transportation Act embodying economic regulatory reform for transportation. Once published, this paper will serve to stimulate discussion and consultation between the private sector and the Minister on possible future policy options. Although the study team will undoubtedly want to examine and take note of the implications of this paper for its study, the team's central task will be to advise the Ministerial Task Force along the lines set out above.

COMPOSITION OF STUDY TEAM

The study team will be led by a federal government executive at the EX-4 level who has been appointed in consultation with Transport Canada, the department that will be most affected by this program assessment. The study team leader will report to both the Public Sector and the Private Sector Liaison Advisors serving the Chairman of the Task Force. The director will be supported by seconded government officers and a number of private sector representatives approved by the Private Sector Advisory Committee. The study team, or its leader, will meet with the Public Sector and Private Sector Liaison Advisors at their request.

WORK PROGRAM

In view of the number of programs that fall within the general category of transportation, it seems desirable to assign specific tasks to sub-teams dealing with specific subjects. To this end, the study team will submit for consideration by the Ministerial Task Force a detailed workplan showing which sub-teams will be organized for that purpose.

REPORTING SCHEDULE

The study team will strive to report its initial findings to the Ministerial Task Force on September 9,

Basis and Beneficiaries

a. Legislative mandate for the transportation program.
b. International obligations requiring a federal transportation program.
c. Objectives of the transportation program.
d. Relationship between the objectives and the beneficiaries.
e. Principal beneficiaries of each transportation program.
f. Geographical distribution of benefits for each transportation program.
g. Beneficiaries of federal programs that are also beneficiaries of provincial programs.
h. Contributions to the cost of a transportation program made by the beneficiaries of the program.

Efficiency and Overlap

a. Programs which are particularly troublesome to beneficiaries in terms of red tape, paper work and delays.
b. Programs or parts of programs that might be delivered more efficiently at the provincial or municipal level.
c. Programs or parts of programs that might be delivered more efficiently by private sector organizations.
d. Programs or parts of programs for which safety and efficiency are inversely inter-related.
e. Programs or parts of programs that might be more appropriate for other government departments.
f. Programs or parts of programs not directly related to public transportation.

Gaps and Omissions

- Direct spending or tax expenditure programs which should be taken into account in this review but are not in the list of programs in Annex A.

LINKAGES WITH OTHER PROGRAM REVIEWS

A number of these programs were previously identified for review by other study teams as shown by the annotations on Annex A. Appropriate cross-referencing and consultation will be assured by the study team so that Task Force members will be apprised of the results of the earlier work. Where

1985. In addition, the Task Force will receive brief progress reports on the work of the study team at all regular meetings.

COMMUNICATIONS WITH DEPARTMENTS

Ministers of those departments directly affected by this review will be advised which programs under their jurisdiction will be included.

TRANSPORTATION PROGRAMS

DEPT	PN	TITLE
*CTC	2	REGIONAL AIR CARRIER SUBSIDIES
*CTC	12	WATER TRANSPORT REGULATION
CTC	13	TRAFFIC AND TARIFF ANALYSIS
CTC	15	TRANSPORT RESEARCH
*CTC	20	AIR TRANSPORT REGULATION
*CTC	30	MOTOR VEHICLE TRANSPORT REGULATION
*CTC	40	RAILWAY ECONOMIC ANALYSIS
*CTC	45	RAILWAY SAFETY
*CTC	50	RAIL BRANCH LINE SUBSIDIES
CTC	55	RAIL PASSENGER SERVICE SUBSIDIES
*EC	95	HIGHWAY BRIDGES OVER CANALS
*EMR	213	SMALL PROJECTS FUND - TRANSPORTATION
HWC	17	CIVIL AVIATION MEDICINE
INAC	112	CANADA - NWT - HIGHWAY RECONSTRUCTION
INAC	86	NORTHERN ROADS AND INFRASTRUCTURE
*PRTC	1	PORTS CANADA
PWC	118	MARINE TRANSPORTATION AND RELATED ENGINEERING LOCK AND DAMS
*PWC	120	MARINE TRANSPORTATION AND RELATED ENGINEERING PROGRAM PLANNING AND CONTROL (RE 118/119)
*PWC	121	LAND TRANSPORTATION PROGRAM - HIGHWAYS
*PWC	122	LAND TRANSPORTATION PROGRAM - BRIDGES
*SLSA	6	JACQUES CARTIER AND CHAMPLAIN BRIDGES
*SC	999	AVIATION STATISTICS CENTER
TC	1	AIR TRANSPORTATION TAX
TC	2	AVIATION CAREERS
*TC	3	AERONAUTICAL FLIGHT SAFETY AIDS
*TC	4	AIR CARRIER OPERATING CERTIFICATES
TC	6	AVIATION SAFETY INFORMATION
TC	8	AIRCRAFT SEARCH AND RESCUE ALERT
*TC	9	AIR TRAFFIC CONTROL
*TC	10	AIRPORTS AND AREA CONTROL SERVICES
*TC	11	AIRSPACE MANAGEMENT
*TC	12	AIRSPACE RESERVATION SERVICE
TC	13	AVIATION ACTIVITY FORECASTS
TC	14	CIVIL AVIATION PERSONNEL LICENSING
TC	15	AVIATION PERSONNEL LICENCE STUDY AND REFERENCE GUIDES
TC	16	FLIGHT INSTRUCTOR COURSES
TC	17	FLIGHT CREW AND AME LICENSING
TC	22	CIVIL AIRCRAFT REGISTER

TC	23	AERONAUTICAL INFORMATION SERVICE
TC	25	AIR REGULATIONS ENFORCEMENT
*TC	26	AIRWORTHINESS/AIRCRAFT
TC	27	BALLOON LAUNCHING REGULATION
TC	28	FLIGHT TEST STANDARDS AND GUIDES
TC	29	PARACHUTING REGULATION
TC	30	NAVIGATION AND FLIGHT INSPECTIONS
*TC	31	FLIGHT SERVICE STATIONS
*TC	32	AIRPORT FACILITIES
TC	33	CRASH, FIREFIGHTING AND RESCUE SERVICES
TC	34	AIRPORT MARKETING PROGRAMS
TC	35	AIRPORTS OPERATIONS/SIMULATION MODELS
TC	36	AIRPORT SECURITY
*TC	37	AIRPORTS POL/STD/GUIDELINES
TC	39	ICEBREAKING
TC	40	SEALIFT
*TC	43	MARINE ENGINEERS/EXAMINATION
*TC	44	MASTERS, MATES AND CREWS/EXAMINATION
TC	45	LAKE ONTARIO WATER LEVELS
*TC	46	MARINE AIDS TO NAVIGATION
TC	47	RADIO AIDS/MARINE NAVIGATION
*TC	48	NAVIGATION AIDS - LISTING
TC	49	ST. LAWRENCE ICE CONTROL
TC	50	ST. LAWRENCE WATER LEVELS
TC	51	ST. LAWRENCE AND SAGUENAY RIVERS NAVIGATION
*TC	56	SHIP POLLUTION REGULATIONS
*TC	58	SMALL VESSEL REGULATIONS
TC	59	MARINE RADIO COMMUNICATIONS SERVICES
*TC	60	MARINE CASUALTY INVESTIGATION
*TC	61	NAVIGATION/MARINE SAFETY NOTICES
TC	62	SEARCH AND RESCUE/MARINE
*TC	63	SHIP ELECTRONIC EQUIPMENT
*TC	64	SHIPS SURVIVAL EQUIPMENT
*TC	65	VESSEL TRAFFIC SERVICES/TRAFFIC MANAGEMENT SERVICES
*TC	66	SHIPPING NOTICES
*TC	67	PUBLIC PORT FACILITIES
TC	68	MARINE REGULATION PUBLICATIONS
TC	69	MARINE EMERGENCIES (NON-SAR)
TC	70	MARITIME POLLUTION CLAIMS FUND
TC	71	PILOTAGE AUTHORITIES
TC	72	SHIPBUILDING INDUSTRY ASSISTANCE PROGRAM
*TC	73	FERRY SERVICES
TC	74	BLUE WATER BRIDGE AUTHORITY
TC	75	GRAIN TRANSPORTATION
TC	76	GRAIN TRANSPORTATION AGENCY-ADMINISTRATION
TC	77	RAILWAY FREIGHT
TC	78	RAILWAY PASSENGER

TC	79	RAILWAY RELOCATION AND CROSSING
*TC	89	MOTOR VEHICLE TEST CENTRE
TC	90	URBAN TRANSPORTATION ASSISTANCE PROGRAM
TC	91	TRANSPORTATION OF THE HANDICAPPED
*TC	92	TRANSPORTATION OF DANGEROUS GOODS/REG.
TC	93	TRANSPORTATION OF DANGEROUS GOODS/INSP.
TC	94	CANUTEC
TC	95	TRANSPORTATION OF DANGEROUS GOODS - TRAINING
*TC	96	TRANSPORT UNIVERSITY PROGRAMS
*TC	98	COASTAL LABRADOR AIRSTRIP PROGRAM
*TC	99	FINANCIAL ASSISTANCE TO CONSTRUCTION AND OPERATION OF NON-FEDERAL AIRPORTS
*TC	100	CONSTRUCTION OF AIR TRANSPORTATION INFRASTRUCTURE IN NORTHERN QUEBEC
*TC	102	RESEARCH - RAIL ELECTRIFICATION DEMONSTRATION
TC	104	ATLANTIC PROVINCES PRIMARY HIGHWAY STRENGTHENING
TC	105	FEDERAL/PROVINCIAL HIGHWAY AGREEMENTS
TC	108	FINANCIAL ASSISTANCE FOR HARBOUR IMPROVEMENTS
TC	210	GRANTS TO PROVINCES IN SUPPORT OF FERRY SERVICES
TC	220	BRANCH LINE ABANDONMENTS
TC	225	ACQUISITION AND LEASING OF HOPPER CARS
TC	230	NEWFOUNDLAND RAILWAY TESTING AND EVALUATION
TC	235	COMMUTER RAIL SERVICES
TC	240	VEHICLE SAFETY AND ENERGY OPERATIONS
TC	245	TRAFFIC SAFETY STANDARDS AND RESEARCH
TC	250	PLANNING AND REGIONAL OPERATIONS
TC	255	SUBSIDIARY AGREEMENTS ON TRANSPORTATION DEVELOPMENT
TC	260	VICTORIA JUBILEE BRIDGE
TC	300	WATERWAYS DEVELOPMENT
*TC	305	VESSEL TRAFFIC SERVICES (VTS)
*TC	310	AIR CUSHION VEHICLE REGULATION
*TC	315	PERSONNEL REGULATION
*TC	320	SHIP REGULATION
*TC	325	SHIP RADIO INSPECTION REGULATIONS
*TC	330	NAVIGABLE WATERS PROTECTION
TC	400	SPECIAL AVIATION EVENTS
*TC	405	AIRCRAFT REGISTRATION
*TC	410	AIRPORT FACILITIES AND AIRPORT SERVICES
*TC	425	AIR NAVIGATION AIDS

*TC	500	INSPECTOR GENERAL - TRANSPORTATION SAFETY
TC	515	TRANSPORTATION RESEARCH AND DEVELOPMENT
*TC	600	CANADIAN AVIATION SAFETY BOARD
*TC	999	MOTOR CARRIER REGULATION COORDINATION

* Program assessment to include assessments of earlier study teams

Notes:

1. The study team did not review:

   TC - 2
   TC - 72

2. The study team reviewed and prepared program assessments for:

   - the Canadian Coast Guard College
   - the Transport Canada Training Institute

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SUMMARY

This report summarizes the work of the Study Team on Transportation that examined 126 federal government programs which, in total, account for approximately $2.9 billion in net expenditures and 20,544 person-years for the 1985/86 fiscal year.

The primary objective of the study team was to assess the need for continuation of these federal government transport programs and, where continuation seemed necessary, to review the effectiveness of program delivery. Appropriate emphasis was placed on expenditures, and reducing the extent to which federal government programs interfere with industrial efficiency or impede industry's ability to adapt to changing conditions.

As in any sector, rational assessment of the extent of government involvement could only be done within the context of government policy. For this reason, the study team took into account the changing policy environment as reflected primarily in the Minister of Transport's document on economic regulatory reform and in the May 1985 federal budget.

Part 1 of the report provides background information on the objectives of the study team, the importance of transportation in the Canadian economy, the nature and extent of federal involvement in transportation, and a description of the changing policy environment.

Part 2 serves as the data and information base for the final conclusions. Programs that share similar objectives are discussed in the Overview followed by more detailed individual program profiles.

Part 3 deals with a number of related policy and program issues including proposed regulatory changes.

In reaching its final conclusions, the study team was guided by six basic principles.

a. There should be equitable treatment among competing modes of transportation with respect to subsidies, the degree of cost recovery achieved and the level of service provided or supported by the federal government.

b. Public subsidies for selected carriers should not adversely affect unsubsidized competing private carriers by depriving them of reasonable returns or incentives for product and service improvements.

c. Where transportation service must be provided as an imposed public duty requiring subsidies, the least-cost mode of transportation should be selected and reimbursed on a commercial basis, and competing modes of transportation should not be subsidized.

d. All federal government expenditures and regulations for transportation should be assessed in relation to public benefit with adequate industry consultation.

e. Divestiture of federal assets should include consideration of the value of those assets.

f. Reductions in federal government programs that deliver services to the public should be matched by corresponding reductions in internal staff and other resources.

While a detailed listing of the study team's proposals can be found in the body of the report, the major findings are summarized below. In the view of the study team:

a. Three major program groups, namely, rail passenger, Canadian Coast Guard, and air transportation programs account for 64 per cent of the total costs of all programs reviewed by the study team. These are the program groups where difficult decisions must be taken to rationalize transportation expenditures.

b. The costs of rail passenger services are disproportionate to real public needs. Policies should be considered to eliminate almost all public subsidy for these services through an integrated and aggressive program of public information, cost reduction, and higher user charges that reflect the true costs of the public service provided. For the few remaining cases of service to truly remote communities, rail passenger service could be subsidized only where it cannot be shown that alternative air or bus services can be provided at lower public subsidy.

c. The federal government could reduce its involvement in airports and vigorously pursue opportunities for divestiture or local management of federal airports.

d. Transportation expenditures for civil aviation operations and airports could be fully recovered through the introduction of additional user and passenger charges that reflect the true costs of the public service provided.

e. In the case of water transport assistance, particularly in Atlantic Canada, the public has been led to expect a certain level of service at very low fares, regardless of how costly and uneconomic these services might be. It is essential to reduce net expenditures significantly through an integrated approach involving an aggressive program of public information, cost reduction, realistic user charges, and the substitution of lower cost alternatives such as air transportation.

f. Programs associated with the Canadian Coast Guard remain the most costly, even after consideration of all potential reductions in expenditures covered by this review. The creation of an expert public/private sector task force is suggested to review the mandate and tasking of the Coast Guard and to identify specific initiatives that can be used to reduce program costs and increase revenue.

g. In the case of grain transportation, efforts should be directed at achieving a grain distribution and handling system, based on commercial decision-making, in which the farmers as producers receive direct subsidies as opposed to payments being made to the railways. In this way, producers could purchase the lowest cost transportation offered by trucking companies and railways, without undue restrictions. Under this system, once the railway's capital invested in equipment and expended during the Crow freight rate freeze has been restored, the real costs of equipment acquisition and railway branchline rehabilitation should be reflected in railway rates, eliminating the need for further government involvement.

h. In any transportation program for which the federal government imposes a public duty on a carrier or other component of the transportation system, the federal government should provide for reimbursement on a commercial basis.

i. No new or amended regulation should be promulgated unless the net benefit to society is positive, and definitive guidelines should be enunciated so as to limit the involvement of legal officers having responsibility for the Statutory Instruments Act.

j. Except in exceptional circumstances, no infrastructure or service improvement should be financed by the federal government unless the benefit/cost analysis is positive and unless there has been meaningful consultation with the industry.

k. To the extent that financial assistance is provided to provincial governments for transportation improvements, these improvements should be negotiated as components of subsidiary agreements as part of the Economic and Regional Development Agreement, in accordance with provincially determined priorities.

l. The federal government should strive to reduce or eliminate its involvement in a number of other programs, including: bridges; sections of the Trans Canada Highway; highways in Yukon and the Northwest Territories; Public Works Canada locks and dams; and non-constitutional ferry services in Atlantic Canada and British Columbia. To assist in this respect, the Federal/Provincial Relations Office could develop, in consultation with affected federal departments, an integrated approach for negotiating with the provinces and territories that involves the assembly of comprehensive data and information and the development of priorities and strategies.

These findings lead to proposals for elimination or downsizing of a number of existing programs and disbanding several organizational entities.

With respect to implementation, it is clear that considerable opposition will be encountered. It is the study team's opinion that much public opposition to program reductions is based on uninformed opinion. Accordingly, the study team recommends to the Task Force that the government consider placing special emphasis on publicizing information on the real costs, revenues, tariffs, cost recovery, subsidies, and utilization of all freight and passenger transportation services provided or supported by the federal government so as to encourage more informed and rational public dialogue on major transportation programs which draw heavily on public finance.

PART I: BACKGROUND

INTRODUCTION

This report summarizes the findings of the Study Team on Transportation. In broad terms, the primary objective of the study team was to assess the need for continuation of federal government transport programs and where this seemed necessary, to review the effectiveness of program delivery to determine whether there are programs that might be:

- more effectively administered by other departments of the federal government, other levels of government or the private sector;
- reduced in size; and
- managed more effectively and efficiently.

THE IMPORTANCE OF TRANSPORTATION

Expenditures on transportation including private automobiles are equivalent to some 20 to 25 per cent of the gross national product of the Canadian economy, a larger proportion than in any other industrialized nation. In addition to the magnitude of the expenditures, transportation has a significant impact on the spatial pattern of economic activity with corresponding effects on the pattern of regional economic development.

The relative importance of transportation in Canada can be attributed to three basic factors. First, due to a sparse population that is distributed over a large area, the movement of goods and persons involves long distances and generally modest volumes of traffic. As a result, except in the regions of highest population density, it is often difficult to achieve economies of scale. Simply stated, infrastructure costs spread over large areas and a small population result in much higher unit costs of transportation than would be the case if the same population were concentrated in a smaller geographical area.

Second, the nature of Canada's economic base makes it particularly sensitive to the performance of the transportation system. In any production process, the importance of transportation is directly related to the value of products and commodities in relation to weight. Commodities that have low value/weight ratios, such as grain, lumber, or other natural resources, can absorb only small transport costs before they are priced out of potential markets. Because so much of the Canadian economy is based on the sale of large volumes of low value/weight ratio products that must be transported long distances to markets, transport efficiency has long been recognized as an essential ingredient of economic growth and development.

Third, aside from direct economic consequences, transportation is perceived to have important social and political implications with respect to small and isolated communities, and the reduction of regional disparities. These implications are clearly reflected in the terms of Confederation. They are also reflected in continued pressure from regional groups, despite economic realities, to achieve uniform levels in the quality and costs of transportation service available throughout the country. Indeed it is apparent that federal involvement is frequently influenced more by employment considerations than by transportation requirements.

FEDERAL INVOLVEMENT IN TRANSPORTATION

Governments to varying degrees invest, own, operate, subsidize and regulate various components of the transportation system at the national, regional and local levels. Just as transportation accounts for a large component of Canada's gross national product, government expenditures for transport account for a large component of federal, provincial and municipal net expenditures.

In the federal government, Transport Canada's and the Canadian Transport Commission's Main Estimates for 1985/86 indicate that together they will employ over 22,000 persons, spend about $5.5 billion, and earn revenues of about $0.7 billion. In addition, other departments concerned with northern development and public works employ another 160 persons and spend about $120 million on transportation-related programs. The federal government's involvement is even larger when account is taken of crown corporations such as Air Canada, Canadian National, VIA Rail and CN Marine.

Some federal transport programs directly support government responsibilities in the areas of economic and safety regulation and accident prevention. Others provide direct financial assistance to specific groups of users in the form of subsidies, to specific regions in the form of cost-sharing programs, and to specific carriers in the form of facilities and services.

Some of these activities derive from statutory obligations as defined under the terms of Confederation or legislation such as the National Transportation Act, the Railway Act and the Western Grain Transportation Act. Other programs result from a variety of ad hoc decisions involving federal/provincial agreements negotiated on a project specific basis. In addition, there are programs that involve entirely discretionary expenditures, based on decisions or recommendations of the Minister of Transport.

As an indication of the extent of federal involvement in the transport sector, Table 1 and Figure 1 summarize information on employment and net government expenditures associated with various transport programs reviewed by the study team. Annex A provides a complete listing of these programs.

In considering this summary, it must be borne in mind that the scope of the study team's mandate excluded a number of large programs, including major payments under special legislation such as the Western Grain Transportation Act and the Maritimes Freight Rates Act, as well as the operation of Canarctic, the Northern Pipeline Agency, etc. These exclusions are described in more detail later in this report. The combined net expenditures of these exclusions add approximately $2.5 billion to the total shown in Table 1.

TABLE 1

Summary of Annual Transport Program Resources Reviewed by the Study Team on Transportation (1985/86)[1]

	Program	Person-Years No.	%	Net Cost ($000)	%
1.	Economic Regulation	515	2.5	29,840	1.0
2.	Safety Regulation	1,840	9.0	135,360	4.7
3.	Accident Investigation	252	1.2	17,207	0.6
4.	Air Transportation Operations[2]	10,970	53.4	591,858	20.4
5.	Canadian Coast Guard[3]	5,989	29.1	664,691	22.9
6.	Ports[4]	93	0.5	82,800	2.8
7.	Rail Passenger Services[5]	36	0.2	613,304	21.1
8.	Grain Transportation	37	0.2	237,718	8.2
9.	Railway Freight	34	0.2	22,252	0.8
10.	Transportation Expenditures for Economic Development	6	0.0	105,888	3.6
11.	Water Transport Assistance	27	0.1	216,109	7.4
12.	Federal Highways, Bridges Locks and Dams	101	0.5	116,360	4.0
13.	Transportation Research	146	0.7	26,804	0.9
14.	Other[6]	498	2.4	45,737	1.6
Total		20,544	100.0	2,905,928	100.0

[1] This summary does not include resources for the following programs: MFRA; ARFA; At and East; WGTA; Northern Pipeline Agency; or internal administrative programs of the department. In some cases, figures represent best estimates based on some components which reflect 1984/85 data.

[2] Excludes about $50 million in overhead related to the Air Administration, the costs of the executive aircraft fleet, and non-Transport Canada aircraft procurement.

[3] Excludes about $30 million in overhead related to the Marine Administration.

[4] Excludes Ports Canada.

[5] VIA Rail person-years are excluded but payments to VIA are included.

[6] The Training Program Profile is by far the largest component, accounting for 413 person-years and $37.7 million of net costs.

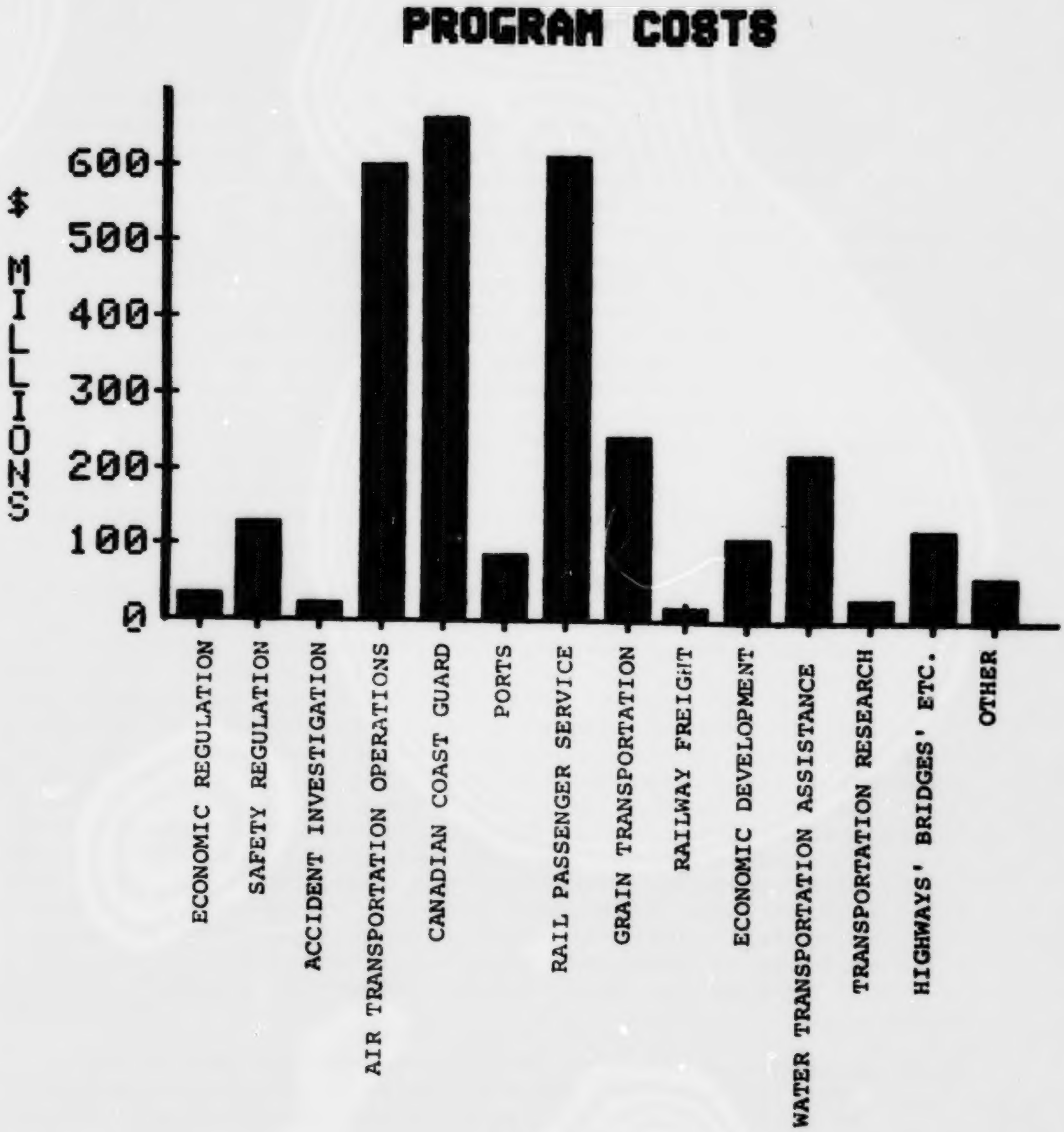

Figure 1
Annual Transport Program Resources

POLICY ENVIRONMENT

This study dealt with the delivery of federal government transport programs in terms of need, value, appropriateness, effectiveness, and efficiency. Need, value, and appropriateness of government activity can only be properly assessed within the context of overall government policy applicable to a particular sector. That policy is now in the process of change. While legislation which created the National Transportation Act of 1967 and which amended other Acts related to transportation still remains the primary existing authority with respect to policy objectives, it would be unrealistic to ignore a number of recent policy initiatives that have been taken. These initiatives are reflected in the Minister of Transport's legislative preview paper entitled Freedom to Move, in the recent federal budget papers, in pending legislation concerning rail passenger services, and in the department's statement of corporate goals and proposed reorganization.

NATIONAL TRANSPORTATION POLICY

The legislation of 1967 and subsequent amendments reduced to a considerable degree the level of government intervention in the setting of rates (except for air carriers) for different modes of transportation. This legislation also recognized that the costs of imposed public duties related to the provision of uneconomic rail services (both freight and passenger) should be removed from the carriers and borne directly by the federal government where the public interest requires that such services be continued. Nevertheless, a significant regulatory role was retained by the government with respect to entry control (operating licences), acquisitions, the investigation of monopolistic and predatory pricing, the special problems of captive shippers and remote communities, and safety regulation.

During the last several years, emphasis has been placed on economic regulatory reform and the creation of more competitive environments, at least for certain types of transportation services. To cite the recent paper on transport policy, "the proposals for a new transportation framework are based on the principles of greater reliance on competition and market forces, a reduction of government interference and regulation, and the creation of a regulatory process that is open and accessible".

In essence, these principles suggest the formulation of policies that place more reliance on competition and less on government regulation as the basic means of achieving improvements in national transportation system efficiency. For example, carriers wishing to enter new markets will only be required to conform to a concept of "fit, willing, and able" rather than being required to prove that their services are essential as a matter of "public convenience and necessity". They also suggest more emphasis on the application of commercial principles to the provision of transportation services and the transfer of those government functions which do not necessitate a federal presence to the private sector.

THE FEDERAL BUDGET

While the proposed regulatory changes embodied in Freedom to Move focus on improving efficiency and lowering costs within the transport sector, the May 1985 federal budget places particular emphasis on reducing the national deficit in absolute terms. Inasmuch as federal government programs in transportation contribute significantly to the national deficit, the fiscal objectives embodied in the budget imply a need to achieve higher cost recovery from users in a manner that keeps pace with cost escalation, as well as the withdrawal from services that are no longer essential.

PENDING RAIL PASSENGER LEGISLATION

Subsidies paid by the federal government for the provision of rail passenger services represent the largest discretionary transport expenditure in the federal budget, accounting for some $600 million of the current year deficit. Although details of proposed rail passenger legislation have yet to be released, discussions with the railways and VIA Rail suggest that new legislation will phase in significant reductions in the total annual subsidies for these services through improvements in operating efficiency, establishment of higher cost-recovery objectives, and elimination of certain services that fail to meet the proposed financial targets over a reasonable period of time.

TRANSPORT CANADA CORPORATE PRIORITIES

Although the basic responsibilities of the federal government with respect to transportation derive from constitutional requirements and a wide range of existing legislation, the range of departmental programs has expanded significantly over time in response to various internal initiatives, federal/provincial agreements and Cabinet directives. In attempting to rationalize and consolidate the department's role, a new statement of corporate goals and objectives with a new organizational structure have been proposed for Transport Canada to serve as a basic guideline for the future. This restructuring is intended to achieve major reductions in both departmental employment and budget over a five-year period.

To summarize, there are a number of policy initiatives and internal adjustments described for which the necessary changes to existing legislation have yet to be authorized by Parliament. However, to the extent these principles, proposed legislative changes, and modifications to existing goals and organizations reflect the major direction in which the federal government intends to proceed in transportation, they had to be taken into account in assessing the existing programs.

ORGANIZATION OF THE STUDY

APPROACH

The approach followed by the study team embodied two basic principles. First, is the program fulfilling a real need or is it simply the vestige of an earlier environment? If the raison d'être for the program remains valid, can the program be delivered more cost effectively so as to be more responsive to the public served? Here, cost effective includes consideration of the merits of transferring some programs to the private sector or local authorities where greater efficiency can be expected; of eliminating some programs that have outlived their usefulness; of attaining greater cost recovery for some services provided by the federal government; and of achieving greater productivity within the bureaucracy.

Aside from the direct impact of government programs, indirect costs are often passed on to the private sector, users, and other levels of government as a result of regulatory requirements or other prescribed procedures. Thus, the second principle is directed at reducing the extent to which federal government programs interfere with industrial efficiency or impede industry's ability to adapt to changing conditions.

Based on these principles, the following specific questions have been raised in assessing individual programs:

a. Is the program justified in terms of the benefits derived when compared with the costs of the program?

b. If the program's net value to society is positive, should it continue as a federal government program or could it be handled more effectively by other levels of the government or the private sector?

c. Are programs that should be continued in the federal government now located in the most appropriate department, or should some other department assume primary responsibility?

d. How can the cost effectiveness with which a program is managed be improved by reductions in size, greater cost recovery, and improved efficiency?

SCOPE

One hundred and twenty-six federal government programs in the transport sector are covered by this review. The scope of the study encompasses most programs with an external element now administered by Transport Canada and the Canadian Transport Commission, as well as a small number of transportation programs administered by Indian Affairs and Northern Development, Public Works, Environment, Health and Welfare, and Statistics Canada. Departmental administrative, policy and coordination activities that do not deliver identifiable products to the public are largely excluded. Most crown corporations in transportation, as well as payments made under the following programs, are also excluded:

- Maritime Freight Rates Act;
- Atlantic Region Freight Assistance;
- At and East; and
- Western Grain Transportation Act.

Subsidy programs for rail passenger service are covered by the study although the VIA Rail organization itself is excluded.

Because the programs reviewed by the study team vary considerably from region to region and mode to mode, no single classification system is ideal from the standpoint of either analysing or reviewing the effectiveness of federal government programs in the transport sector. Some transport programs can best be grouped along modal lines, and others according to a functional classification such as economic regulation, safety, research, and economic development. For this reason, the following hybrid grouping of programs involving a combination of modal and functional categories was used:

ECONOMIC REGULATION
Canadian Transport Commission
Motor Carrier Regulation Coordination

SAFETY REGULATION
Air Safety Regulation
Civil Aviation Medicine
Marine Safety Regulation - Large Vessels
Marine Safety Regulation - Small Vessels
Marine Safety Regulation - Personnel Certification
Marine Safety Regulation - Emergencies Non-SAR
Surface Safety Regulation - Rail
Surface Safety Regulation - Motor Vehicle
Transportation of Dangerous Goods

ACCIDENT INVESTIGATION

AIR TRANSPORTATION OPERATIONS
Air Transportation Tax
Civil Aviation Operations
Airport Operations
Air Transportation Infrastructure in Northern Quebec
Aviation Activity Forecasts

CANADIAN COAST GUARD
Marine Search and Rescue
Marine Aids to Navigation
Icebreaking
Ship Movement Systems and Services

PORTS

RAIL PASSENGER SERVICES
VIA Rail Passenger Service Subsidies
CTC Rail Passenger Service Subsidies

GRAIN TRANSPORTATION

RAILWAY FREIGHT
Railway Freight
Rail Branchline Subsidies
Newfoundland Railway Testing and Evaluation

TRANSPORTATION EXPENDITURES FOR ECONOMIC DEVELOPMENT
Transportation Expenditures for Economic Development - Highways
Transportation Expenditures for Economic Development - Urban

WATER TRANSPORT ASSISTANCE
Water Transport Assistance
Coastal Labrador Airstrips Program

FEDERAL HIGHWAYS, BRIDGES, LOCKS AND DAMS
- PWC Land Transportation - Highways
- Northern Roads and Infrastructure Bridges
- PWC Marine Transportation and Related Engineering - Locks and Dams

TRANSPORTATION RESEARCH

OTHER TRANSPORTATION PROGRAMS
- Transportation of Disabled Persons
- Transportation Training
- Aviation Statistics
- Pilotage
- Sealift
- EMR Small Projects Fund - Transportation

Within these groupings, individual programs of a similar nature were consolidated for ease of assessment and presentation. In the case of transportation research, for example, the research programs of Transport Canada and the Canadian Transport Commission are addressed in one program profile.

METHODOLOGY

Because of the wide range of programs to be considered and the technical expertise essential for their assessment, the Study Team on Transportation was structured differently from the study teams for other sectors examined by the Ministerial Task Force on Program Review. The Study Team on Transportation was comprised of 25 individuals, with six of the study team members and the six-member professional support staff serving as a core group on a full-time basis over the course of the study.

The basic methodology involved assessing the costs and benefits of existing government programs from the perspective of both the public and private sectors. To carry out this assessment, a three-stage process was followed.

Initially, background information on each program to be reviewed was prepared describing program objectives, resources used in terms of various categories of costs, revenues and cost recovery (where applicable), the nature of public benefits and a selected list of program beneficiaries.

Subsequently, through an interview process, information and opinions with respect both to the need for a particular program and to its effectiveness were obtained from three groups: federal government officials responsible for or concerned with the program; provincial government officials in those provinces affected by the program: and private sector individuals representing both the transportation industry and shippers. A list of all contacts is appended to the report.

Finally, all information was reviewed by the full study team in a series of five intensive three-day meetings held at regular intervals during the study period so as to arrive at the conclusions.

PART II: OVERVIEWS AND PROGRAM PROFILES

ECONOMIC REGULATION

OVERVIEW

The economic regulation of air, rail and maritime transport as well as inter-provincial commodity pipelines is the responsibility of the Canadian Transport Commission (CTC), a regulatory agency established by Parliament in 1967 pursuant to the National Transportation Act (NTA). With respect to extra-provincial motor vehicle transport, the CTC has very limited powers as the section of the NTA that would have given the federal government direct control was never proclaimed. In fact, the federal authority has been delegated to provincial highway transport boards. Because of this jurisdictional situation and because the provinces have failed to harmonize these regulations, there has been a policy group in Transport Canada to advise the minister on motor carrier regulation.*

In July 1985, the Minister of Transport revealed for public comment his proposals for economic regulatory reform in a document entitled Freedom to Move which was described as a legislative preview paper. The study team was then faced with the need to determine how it should discharge its responsibilities in light of this document and its mandate to assess existing programs. The team concluded that it would review the efficiency of the delivery of the current programs involving economic regulation under existing legislation, but having regard for the implications of proposed changes, and submit its comments on Freedom to Move in a separate section of its report. Thus this Introduction and the two companion program profiles only address the current programs under existing legislation.

The study team was also aware of the existence of a special task force to examine the relationship between the government or the policy maker, and the independent regulatory agencies. Accordingly, the study team determined that there was no need for it to consider that specific issue as an element of its assessment of existing programs.

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* There are policy groups in Transport Canada to advise the minister on the economic regulation of each mode of transportation. For some reason, only the Surface Administration listed their policy group in the Federal Index. Thus the assessment of programs for Transport Canada air, marine and corporate policy groups is not within the team's mandate.

As a basic theme in its assessment of regulatory programs, the study team urges the federal government to adopt as a policy for regulation generally that no regulation should be promulgated unless the effect is to reduce the regulatory burden on the industry, or unless a competent benefit/cost analysis clearly demonstrates that the benefits to the industry and the public exceed the costs to the industry and the public.

This is similar to the approach advocated in the United States by President Reagan in his directive dated February 17, 1981 from which the following is excerpted:

"... Sec.2 General Requirements. In promulgating new regulations, reviewing existing regulations and developing legislative proposals concerning regulation, all agencies, to the extent permitted by law, shall adhere to the following requirements:

a. Administrative decisions shall be based on adequate information concerning the need for and consequences of proposed government action;

b. Regulatory action shall not be undertaken unless the potential benefits to society for the regulation outweigh the potential costs to society;

c. Regulatory objectives shall be chosen to maximize the net benefits to society;

d. Among alternative approaches to any given regulatory objective, the alternative involving the least net cost to society shall be chosen; and

e. Agencies shall set regulatory priorities with the aim of maximizing the aggregate net benefits to society, taking into account the condition of the national economy, and other regulatory actions contemplated for the future...."

Within the foregoing framework, the study team's consideration of the programs that provide for the economic regulation of the air, rail and maritime modes has led to the following supplementary themes:

- reducing the regulatory burden wherever practical while maintaining the safeguards necessary to protect the public;
- accelerating the regulatory process while lessening the administrative requirements imposed on the industry; and
- reducing the staff of the CTC and having the remaining staff focus on the activities necessary for the CTC to execute its basic mandate.

With respect to Motor Carrier Regulation, the study team supports the consultative process in this area, largely because the provincial governments are responsible for the way system, but is of the view that the federal government has a responsibility to ensure that progress is made. Consequently, the study team has concluded that the federal government must encourage the provincial governments to implement the Memoranda of Understanding now signed, and to develop Memoranda of Understanding on other topics. At the same time, the study team felt that it would be a useful incentive and a practical safeguard for the federal government to ensure that legislation enables them to act in the event that the current inefficiencies and inequities continue.

Finally, the study team wishes to note its concern about a specific policy of the government that is implemented through economic regulation and which, in the view of the study team, visits a hardship on the international air travelling public. At the present time, the utilization of Mirabel is artificially supported through restricting international air carriers on trans-atlantic operations such that the airport at Mirabel must be offered the same level of service as the airport at Toronto despite the difference in the size of the market being served (some 25 per cent of the Canadian population resides in southwestern Ontario, the international market served by Toronto's airport). It is the view of the study team that this artificial barrier to rational airline scheduling should be removed for existing carriers, and should not be a factor in the negotiation of new bilateral air agreements.

CANADIAN TRANSPORT COMMISSION

DESCRIPTION

Regional Air Carrier Subsidies
Air Transport Regulation
Water Transport Regulation
Traffic and Tariff Analysis
Motor Vehicle Transport Regulation
Railway Economic Analysis

This profile covers the overall involvement of the Canadian Transport Commission (CTC) in the economic regulation of the transportation industry in accordance with legislation as it currently exists. The study team has also commented on the proposals for economic regulatory reform outlined in the document, Freedom to Move, in a separate section of its report.

Annex A contains individual program descriptions.

AUTHORITY

The National Transportation Act; the Aeronautics Act; the Railway Act; and the Transport Act.

OBJECTIVES

The commission's objectives are set out in several acts. Those pertaining to economic regulation can be summarized as follows:

a. The National Transportation Act requires the commission to regulate transportation, and to investigate acquisitions of commercial interests in the transportation area when objections are raised.

b. The Aeronautics Act specifies that the commission must license commercial air services, examine and file tariffs, develop air carrier regulations, ensure that operators comply with these regulations, carry out investigations, audits and surveys, and advise the Minister of Transport on air transportation matters.

c. The Railway Act requires the commission to monitor railway equipment, operations and services, to prescribe a uniform "classification of accounts", and to verify certain railway costs and prescribe certain rail rates.

d. The Transport Act gives the commission responsibility for licensing water carriers in designated areas and for examining and filing tariffs between rail or water carriers and shippers.

BENEFICIARIES

The carriers providing for the movement of people and goods within, to and from Canada; travelling and shipping publics; and the public at large.

EXPENDITURES (85/86)	**($000)**
CAP	227
O&M	26,893
Transfer	1,500
Total	28,620
Revenue	-
Net Cost	28,620
Person-years	507

Note: Some elements of the foregoing programs, such as rail and water subsidy audits, analysis of branchline abandonments, etc. are not included in this profile. The expenditures have been adjusted to remove these potential overlaps.

The commission has been advised that the total person-year allocation of 839 will be reduced by 75 effective April 1, 1986. This represents a reduction of 58 to the person-years for economic regulation.

OBSERVATIONS

The Canadian Transport Commission (CTC) is a regulatory agency that was established by Parliament in 1967, pursuant to the National Transportation Act. It replaced the agencies that had regulated air, rail and maritime transport before that date. The CTC also regulates interprovincial commodity pipelines and has some limited powers with respect to interprovincial motor vehicle transport.

With respect to economic regulation, the Minister of Transport released in June a document entitled Freedom to Move, that proposes a substantial change in the degree of regulation, and in the way in which that regulation is exercised. The assessment of the proposed regulatory reform is the subject of a separate section in the study team's report. The purpose of this profile is to address immediate changes that could be made to the economic regulation of transportation under the existing legislation, and to the resources allocated to the commission for its economic regulation activities.

The management of the resources allocated to the CTC has not been good. This was recognized by the central agencies and largely as a consequence of their concerns a comptroller was appointed. This has led to a substantial increase in the resources assigned to management and administration which has served to produce the documents necessary to feed the central agencies' requirements for information and has corrected deficiencies in financial administration, but has done little to improve the overall resource management. The basic problem is that the way in which the management structure of the commission was conceived has never worked well in practice for a number of reasons, and thus, in spite of the efforts of senior managers, the steps taken have been simply band-aids rather than solutions.

With respect to the economic regulation of the air transportation industry, significant relaxation has been implemented as a result of the new Canadian Air Policy announced in May 1984 but that policy envisaged further transitional steps leading to an environment along the lines advocated in Freedom to Move. Because of a lack of certainty as to the government's intentions, the Commission's Air Transport Committee has not proceeded with implementation of all of the proposals in the new policy.

KEY ISSUES

Is there the opportunity for further relaxation of regulation within the existing legislation and, if there is, should opportunities for lessening the burden of regulation be implemented?

Should the resources needed to effect the economic regulation of transportation in Canada under existing legislation be reduced?

ASSESSMENT

Air Transport

There has been a substantial relaxation of the regulatory framework to the benefit of existing carriers, new entrants and the travelling public. In the view of the study team, several additional steps should be taken to further lighten the regulatory burden. Indeed, such steps were envisaged by the new Canadian Air Policy and would be a logical transition to the virtual total deregulation of air transportation envisaged under Freedom to Move. Moreover, implementation of these additional steps would give the air carrier industry and prospective new applicants immediate opportunities while allowing the federal government to monitor the impact on service during this transitory phase.

Specific proposals that, in the study team's opinion, should be implemented immediately because they are part of the current Canada air policy or because they have become policy concerns of the Minister of Transport, as witness his comments in dealing with appeals on decisions of the Air Transport Committee, are outlined below.

Licensing

a. Northern Canada - Entry and Exit Control

- Remove the requirement to prove public convenience and necessity (PC&N) for a change in aircraft size (weight groups), and require carriers to prove that protection on a specific route from charter competition is required by the PC&N.

b. Southern Canada - Entry and Exit Control

- Allow a scheduled air carrier to exit from any market on 60 days notice.
- Remove the requirement to prove financial fitness for weight group changes by charter licensees for certain small aircraft types (weight groups E and below).

c. Canada - Rotary Wing

- Remove the requirement to prove PC&N for rotary wing licensees offering charter services.

Tariffs

a. Scheduled Carriers

- Allow full downward flexibility on domestic tariffs for all scheduled carriers.
- Review all full fare domestic tariff increases on non-competitive routes, and any domestic tariff on complaint.

b. Charter Carriers

- Allow full flexibility for fixed wing charter carrier operations in Southern Canada and reviewing filed tariffs only on complaint.
- Remove requirement for mandatory sale and travel restrictions on domestic resaleable charters.

With these changes and with the removal of the Western Division from day-to-day air licencing activities, a further savings (over the 23 person-years reduction to come into effect April 1, 1986) of 10 per cent (12 person-years) should be achievable.

Railway Transport

The Railway Transport Committee should be required to accelerate its activities in matters of economic regulation so as to respond to the needs of industry on a timely basis.

In addition, the committee should be asked to develop specific initiatives and a specified timetable to reduce the burden of economic regulation on railway operators.

With these changes and greater internal productivity, a person-year reduction of 10 per cent (10 person-years) on the adjusted Reference Level for April 1, 1986 should be achievable.

Water Transport

By eliminating the requirement for annual licences and by further streamlining the administrative processes, it appears that some lessening of the regulatory burden for operators on the Mackenzie River is feasible.

The current extensive committee involvement in international maritime matters more properly is the purview of Transport Canada and the Water Transport Committee's involvement, other than that directly relevant to its regulatory responsibilities, should be phased out within six months.

In light of these changes, a person-year saving of 20 per cent (six PYs) on the adjusted Reference Level for April 1, 1986, should be achievable.

Motor Vehicle Transport

With the elimination of the requirement to grant authority for Sunday operations (because of the striking down of the Lord's Day Act), no further adjustment to the regulatory involvement or the scale of resources (two person-years as of April 1, 1986) seems feasible.

Management and Administration

Even after taking into account the fact that the management and administration function encompasses the full responsibilities of the CTC, it is apparent that it is substantially over-resourced. It would appear that much of the excess has come about as a result of adding the bureaucratic "safeguards" of a line department with little consideration given to the size and role of the organization. To compound the problem, the structure of the commission has encouraged overstaffing in the executive branch. While Personnel and Legal Services resources are better matched to real need, in these too there is some room for reduction.

In light of the foregoing and the study team's preferred action on transportation research, and because of the implications Freedom to Move has for the future planning of the organization, an overall reduction of 15 per cent (32 person-years) from the adjusted Reference Level for April 1, 1986 should be achievable.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Communicate to the CTC the need to further reduce the economic regulatory burden and in this respect specifically:

Air Transport

   a. In northern Canada, remove the requirement to prove public convenience and necessity (PC&N) for weight group changes and ensure that route protection for air carrier licensees is only provided when the carrier has demonstrated it is required by the PC&N.

   b. In southern Canada, remove the requirement to prove financial fitness of charter air carriers for weight group changes below Group F, and allow scheduled air carriers to exit any route on 60 days notice.

   c. In northern and southern Canada, remove the requirement to prove PC&N for rotary wing charter air carrier licences.

   d. In northern and southern Canada, allow full downward flexibility in domestic tariffs for scheduled carriers with provision to review all increases on routes without competition and any tariff on complaint.

   e. In southern Canada, allow full flexibility for fixed wing charter carrier tariffs, reviewing only on complaint.

   f. In northern and southern Canada, remove the requirement for mandatory sale and travel restrictions on domestic resaleable charters.

Railway Transport

   a. Accelerate activities pertaining to economic regulation, especially where public hearings are involved.

b. Develop and implement specific initiatives with a specified timetable to reduce the burden of economic regulation on railway operators for the benefit of the shipping public.

Water Transport

a. Eliminate the requirement for annual licence renewal on the Mackenzie River, replacing this process with a performance requirement so that, as long as the level and quality of service are adequate, the licence continues.

b. Phase out the Water Transport Committee's involvement in international maritime matters except as directly related to its regulatory responsibilities.

2. A further reduction of 60 person-years (over the 75 person-years reduction already imposed as of April 1, 1986) for the CTC appears warranted and should be accommodated by the CTC with no appreciable reduction in the level of service to the public.

3. Communicate to the Canadian Transport Commission that no regulatory amendments should be proposed unless they serve to reduce the regulation of the industry, or unless a competent benefit/cost analysis clearly demonstrates that the potential benefits to society from the regulation outweigh the potential costs to society.

CANADIAN TRANSPORT COMMISSION

DESCRIPTION

Air Transport

The economic regulation of commercial air services in Canada through the development, promulgation, administration and enforcement of comprehensive regulations governing the operation of commercial air services, the licensing of these services, the investigation and monitoring of air carrier operations, the examination and control of tariffs, the review of acquisitions and mergers involving air carriers or commercial air services, economic and financial analysis of the air carrier inudstry; advice to the Minister of Transport on civil aviation matters, commercial air services; the administration of international air agreements including participation in the development and negotiation of such agreements; consultation with foreign aeronautical authorities on scheduled and charter air transport; and the payment of subsidies to Quebecair and EPA for specified routes.

PYs = 150 O&M = $7,591,000
CAP = $15,000 Transfer = $1,500,000

Railway Transport

The regulation of railway services in Canada through the development and promulgation of accounting and costing methodology and the monitoring of the quality of freight and passenger train services.

PYs = 88 CAP = $12,000 O&M = $5,782,000

Water Transport

The economic regulation of water carriers through licensing and inspection and the regulation of rates applicable to this form of transportation.

PYs = 32 CAP = $4,000 O&M = $1,560,000

Motor Vehicle Transport

The review of acquisitions and mergers involving road transport service; and the economic regulation of the CN Roadcruiser Bus Service (Newfoundland).

PYs = 4 CAP = $2,000 O&M = $234,000

Management and Administration

The determination of regulatory matters required of the commission, the development and operation of central management processes; the provision of central administrative services in support of the commission's work. [It is comprised of the Executive Branch (President, Vice Presidents, Commissioners and their staffs); Legal Services; and the Secretariat, both at Headquarters and in the Western Division; the Comptroller's Branch; and the Personnel Branch.]

PYs = 233 CAP = $194,000 O&M = $11,726,000

MOTOR CARRIER REGULATION COORDINATION

DESCRIPTION

The Transport Canada Motor Carrier Branch develops policy advice for the Minister of Transport concerning trucking and motor coach operations.

AUTHORITY

Main Estimates

OBJECTIVES

To develop policy advice for the Minister of Transport on trucking and motor coach operations.

BENEFICIARIES

To the extent that the advice is sound and the Minister accepts and acts on it, the beneficiaries are the carriers and the users of these modes of transportation.

EXPENDITURES (84/85)	($000)
CAP	-
O&M	1,220
Transfers	-
Total	1,220
Revenue	-
Net Cost	1,220
Person-years:	8

Note: Transport Canada's contribution to Statistics Canada for the collection of data pertinent to the trucking and motor coach modes of transportation amounted to some $400,000 in 1984/85.

OBSERVATIONS

Part III of the National Transportation Act proposed to bring the regulation of extra-provincial motor carriers under federal control. This part of the act, however, was never proclaimed except as it pertains to the CN Roadcruiser Service which replaced passenger train service in Newfoundland and is under federal jurisdiction.

Provincial governments have the authority to regulate intra-provincial trucking and busing. Under the Motor Vehicle Transport Act, the administration of extra-provincial trucking was delegated by Parliament to the provincial transport boards.

Trucking regulations vary by province thus posing some barriers to trade and creating some inefficiencies and inequities in the trucking industry.

Deregulation of the U.S. trucking industry has had an impact on, and will have implications for, the Canadian trucking industry.

A "Memorandum of Understanding Respecting a Federal-Provincial-Territorial Agreement on the Economic and Administrative Regulation of Truck Transports", drawn up in February 1985 has been approved and signed by all the parties involved except Quebec. It appears, however, that the new government in Ontario is reviewing the implications of the agreement. Moreover, no provincial government has actually implemented the provisions of the agreement.

Program managers indicated that in addition to policy advice to the Minister, the staff monitor the performance of the trucking industry, provide modal expertise to the Transportation Development Centre, perform a co-ordinating role for inter-provincial disputes, perform a liaison role in trans-border trucking issues, perform statistical analysis of the trucking and bus industries, and participate in setting accessibility standards in respect of transportation for the disabled by bus. The program staff keep abreast of developments in the motor carrier industry, and liaise with the provinces and territories, through active representation on Canadian Conference of Motor Transport Administrators (CCMTA) committees and working groups.

There appears to be some overlap between this program and activities carried out in the CTC.

KEY ISSUES

Should the regulation of extra-provincial trucking be brought under federal control as originally envisaged in Part III of the National Transportation Act?

Should this program be continued in its present form?

ASSESSMENT

In the past, the federal role in respect of extra-provincial trucking and bus operations was primarily that of co-ordination and promotion of uniform provincial regulations. CCMTA is the mechanism through which the coordination is carried out.

Implementation of the Memorandum of Understanding will reform extra-provincial trucking regulations in Canada through the adoption of a number of specific actions:

- shifting the burden of proof on entry from the applicant to the respondent;
- eliminating rate approval;
- creating a list of commodities and services exempt from control;
- streamlining operating licences and licence categories; and
- streamlining the licence application process.

There are also four studies agreed upon in the Memorandum of Understanding. These will be carried out by the provinces (two studies) and consultants acting on behalf of the federal and provincial governments (two studies).

In the view of the study team, there is a need to maintain a limited capability within Transport Canada to monitor implementation of the "Memorandum of Understanding" and to advise the minister on issues related to policy development. For example, because of deregulation of the U.S. trucking industry, there is a greater demand than heretofore to address trans-border trucking issues and concerns.

The Regulatory Study Team opted for federal repatriation of authority over extra-provincial trucking. It is the study team's opinion that this is premature. Moreover, it must be recognized that any move to actually repatriate authority over extra-provincial trucking, as opposed to the therapeutic value of having the potential for repatriation, would be problematic. Nonetheless, if there is no progress made on the implementation of the agreement, it would seem necessary for the federal government to be in a position to intervene. Accordingly, it is suggested that the federal government make provision in the proposed legislation pursuant to Freedom to Move for the embodiment of the principles contained in the Memorandum of Understanding and such other provisions as appear appropriate but limited to economic regulation as contrasted with weight/dimension restrictions that would directly relate the infrastructure. Moreover, the regulatory provisions should be in the nature of authorizing the federal Minister of Transport to give direction to the provincial highway boards.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. The Memorandum of Understanding be allowed to stand and unless major problems of implementation develop, no action be taken to involve the federal government directly in the regulation of extra-provincial trucking.

2. The federal government encourage the provincial governments to accelerate implementation of the Memorandum of Understanding.

3. The federal government actively pursue the negotiation of similar Memoranda of Understanding with the provinces and territories for the purpose of achieving uniformity in all relevant aspects of trucking regulation, including confidential contracts, weight/dimension restrictions, etc.

4. This program be discontinued in its present form and its functions carried out by a very small group to advise the Minister on policy related to highway transportation issues.

5. The government make appropriate provision in the proposed legislation on economic regulatory reform for federal involvement in the economic regulation of extra-provincial trucking and busing as a contingency against continued provincial procrastination on action to reduce existing barriers that lead to inefficiencies and inequities.

SAFETY REGULATION

OVERVIEW

The responsibility for safety in federally regulated modes of transportation currently rests with the Transport Canada for air and marine, and with the Canadian Transport Commission for rail. In addition, the department has a limited role to play in the regulation of safety for motor vehicles.

In spite of the concentration of authority and notwithstanding the fact that safety regulation is the principal regulatory activity of Transport Canada, there has been little effort to make comparisons of the relative safety of the modes, to cross-fertilize by testing successful techniques in one mode in another mode, or to consider the merits of other approaches to regulating safety. Indeed, the study team is of the view that one of the most important issues in safety regulation is the degree to which regulatory involvement is inhibiting technological innovation.

To illustrate this latter point, safety regulation in the rail and marine modes is much more in the nature of technical specification than in the air mode. In addition, possibly because of the inherent sensitivity of the subject, the modal regulators have seemed reluctant to attempt the introduction of truly innovative techniques to reduce the burden on the industry while maintaining an effective regulatory environment that would offer an acceptable level of safety to the general public, the travelling public and the employees engaged in the industry being regulated.

Perhaps it is also useful to mention that all modes do not have the same exogenous considerations. For example, rail safety is designed to ensure the safe operation of a privately owned vehicle over a privately owned way system so as to offer an acceptable level of protection to the travelling public and the railways' employees, as well as to the general public that live in close proximity to the rail line (the way system), or the rail yard (the terminal system). In the marine mode, regulation of safety protects the travelling and shipping publics, marine employees and the general public from the environmental and fiscal impact that an accident might cause on a regional or national scale. By contrast, the regulation of air safety is focussed more on the passengers and the flight crew than it is on the general public. It is important to recognize these differences in addressing the delivery of federal programs to regulate safety in transportation.

There are nine program profiles submitted by the study team related to safety regulation. The majority of these programs are delivered by federal government employees, although in some aspects of some programs there is significant involvement by other levels of government (Transportation of Dangerous Goods); and by the industry being regulated (Air Safety Regulation).

Notwithstanding the differences among the modes and the limited commonality in the regulatory environment, there are a number of common themes to the study team's assessment. First, the team is concerned that unwarranted regulation causes an unnecessary cost to the industry and hence to the travelling and shipping public being served by that industry. The team suggests that this would be addressed in large measure if the requirement to do a benefit/cost analysis, and to be able to show a positive net benefit to society were made mandatory for every new or amended regulation. (This is also a finding in the Introduction on Economic Regulation.)

Second, the current heavy reliance on technical specifications has two serious drawbacks. Rigid compliance with the regulatory technical specifications leaves no room for the industry to make self generated improvements, and the industry is forced to adhere to a specification rather than to address the need to operate safely. While the study team is not advocating a simple statement of an acceptable level of risk, it is the team's conclusion that the adoption of performance specifications rather than technical specifications would be a far more enlightened and productive approach to safety regulation.

Third, more use could be made of the industries' capacity and indeed corporate interest in operating safely. Again there is a definite limit on the extent to which this can be utilized but suffice it to say large companies have a vested interest in ensuring the safety of their product because nothing affects the stability of their operation more quickly and directly than consumer or public concern over safety. Thus, self-regulation to approved performance specifications with compliance audits appears to be a viable alternative in a number of areas to the existing situation.

Finally, it is essential to ensure that the safety regulatory authority has adequate resources to discharge its mandate with an acceptable level of service to the industry being regulated and the personnel being licensed. This is especially important as the federal government proceeds with reform in the economic regulation of transportation.

In addition to the foregoing common themes, there are a number of modal specific themes that are summarized in the following sub-sections.

Air Safety Regulation and Civil Aviation Medicine

The study team's assessment reflects the view that the department's air regulations are generally good and that there is effective consultation with industry on proposed [illegible] or amended regulations. At the same time, the team is concerned that there are resource constraints which are affecting performance in some areas that perhaps could be alleviated by more delegation to industry in monitoring compliance but can only be solved by allocating more resources to these regulatory tasks. The other major difficulty that is seriously impairing the department's performance is caused by legal advisors in the Privy Council Office charged with the responsibility of vetting regulations pursuant to the Statutory Instruments Act. (See the program profile which follows for an explanation of the problem.) The team believes that action on a priority basis is required to address both of these concerns. The study team also concludes that the licensing and certification aspects of air safety regulation should be self-financing.

The resource shortage in civil aviation medicine appears to be critical and there is an urgent need to augment the resources allocated to this vital aspect of civil aviation safety. The study team is also of the view that relocating the Civil Aviation Medical Unit to Ottawa has considerable merit and should be accomplished as soon as possible.

Marine Safety Regulation

By and large, the marine safety regulation programs are delivered by the federal government directly, which contrasts with the situation in many other countries where delivery is through non-government institutions.

The duplication of hull and machinery inspection for large vessels maintained in class is an unnecessary burden on the shipping industry. The Canada Shipping Act should, in the view of the study team, be amended to enable hull and machinery inspection as well as the inspection of safety equipment and procedures to be delegated to approved classification societies for vessels maintained in class. At the same time, government inspection fees could be increased over time so as to recover all inspection costs. In addition, the study team proposes that the department determine if it would be cost effective to transfer all hull and machinery inspection to classification societies.

Small vessels benefit from marine aids to navigation and are a significant user of marine search and rescue services.

The study team believes that pleasure boaters and other small vessel owners should pay part of the costs of these two programs, and has concluded that a scaled license fee should be instituted for this purpose. The study team is also of the view that funding should be increased for private organizations so that they can intensify their instructional efforts to promote boating safety.

In the case of personnel certification, the study team has concluded that more marine training of Canadian Coast Guard (CCG) personnel should be carried out at private institutions. This finding does not apply to officer training conducted at the CCG College. It is also proposed that examination procedures be modified and that fees be increased to recover all personnel certification costs.

For non-search and rescue emergencies, the study team supports continued federal government involvement but with the petroleum industry and/or shipping interests assuming a greater responsibility for the clean-up of oil spills. The team believes that the costs of the program can be reduced through increased contracting-out and that the remaining costs should be funded though a levy on the petroleum/chemical shipping industry.

Surface Safety Regulation - Rail

In common with some of the key themes expressed above, the study team is of the view that a firm move towards regulations based on performance specifications in contrast with the present use of detailed technical specifications has much merit. Additionally, emphasis should be placed upon the need for socio-economic impact analysis of new or amended regulations, to ensure that if benefits do not exceed costs, regulatory change is not introduced.

Surface Safety Regulation - Motor Vehicle

In respect of motor vehicle safety regulations, three major conclusions emerged. First, although privatization of the Motor Vehicle Test Centre does not appear to be a viable option as the major motor vehicle manufacturers have their own test facilities and the smaller ones do not have sufficient requirements to justify its acquisition, the study team suggests that Transport Canada vigorously pursue greater use of the facilities by the private sector and thereby increase cost recovery.

Second, implementation of the announced emission standards have extremely high costs attached to them, in the range of $2 billion to $4 billion. The study team has concluded that introduction of these standards should be reviewed by Transport Canada and a report submitted for Cabinet consideration, evaluating thebenefits and costs associated with reducing acid rain levels through this mechanism as compared to other means.

Third, the study team believes that federal government research into motor vehicle safety is an inhibiting factor to the establishment and development of appropriate capabilities by universities and non-profit oriented research foundations. Therefore the study team has concluded that Transport Canada's involvement in this area should be changed so as to provide a framework for independent research, assisted initially by federal grants.

Transportation of Dangerous Goods

The study team's findings in this area include the need to consolidate the federal resources currently resident in several directorates of Transport Canada and the Canadian Transport Commission into one group, to place limits on the amount of resource consumed by this function, and to move to performance specifications for packaging regulations. In this respect, the merits of adopting International Air Transport Association standards for the shipment of goods by air as an alternative to Canadian codes should be considered.

Additionally, the study team suggests that the government consider intensifying efforts to conclude a reciprocal agreement with the U.S. concerning the transborder movement of dangerous goods.

AIR SAFETY REGULATION

DESCRIPTION

Air Carrier Operating Certificates
Aviation Safety Information
Civil Aviation Personnel Licensing
Aviation Personnel License Study and Reference Guides
Flight Instructor Courses
Flight Crew and AME Licensing
Civil Aircraft Register
Aeronautical Information Service
Air Regulations Enforcement
Airworthiness/Aircraft
Balloon Launching Regulation
Flight Test Standards and Guides
Parachuting Regulation
Special Aviation Events
Aircraft Registration

Annex A contains individual program descriptions.

AUTHORITY

The National Transportation Act and the Aeronautics Act are the principal Acts governing the Air Transportation Program. The Aeronautics Act, in particular, requires the Minister of Transport to control and regulate civil aviation and to supervise all matters connected with civil aviation.

OBJECTIVES

The objective is to promote and maintain safety of flight in the national air transportation system.

BENEFICIARIES

The major benefit is the provision of a safe and secure national civil air transportation system. Beneficiaries include the aerospace industry, civil air carriers, general aviation operators and the general public.

EXPENDITURES (85/86)	**($000)**
CAP	1,007
O&M	60,059
Transfer	80
Total	61,146
Revenue	822
Net Cost	60,324
% Cost Recovery	1
Person-years	921

Note: Includes an estimate of the resources for aircraft services directly in support of Air Safety Regulation (114 person-years and $8.75 million).

OBSERVATIONS

Aeronautical Regulatory Services performs all regulatory functions connected with civil aeronautics other than economic regulation. It certifies and monitors:

- the competence of aeronautical personnel such as pilots, flight engineers, aircraft maintenance engineers, and air traffic control operators;
- the airworthiness of aircraft;
- the geometric design of airfields and the design of air way systems;
- the reliability and safe operation of airport and air navigation facilities and equipment; and
- the operations of scheduled airlines and other commercial aircraft companies.

An extensive program of standards development, certifying, licensing, inspecting and monitoring exists to carry out these functions complemented by a modest program of air safety promotion.

Overall, the regulation of air safety is conducted reasonably efficiently by competent personnel.

Cost recovery is inadequate as is the level of resourcing. This latter factor has an adverse effect on the aircraft manufacturing and air carrier industries, and might be partially alleviated by more attention to the former.

There is a strong sense that more self-regulation in monitoring compliance with approved procedures supplemented by departmental audits would be more efficient and cost-effective.

The assignment of a full-time airworthiness inspector to the major air frame and engine manufacturers, and air carrier companies with appropriate delegated authority for on-site decision-making is seen as highly desirable because it would facilitate rapid response on technical matters that, when delayed, serve to increase the cost of the undertaking, and could assist in enabling self-regulation of compliance.

With respect to the substance of the regulations, the major complaint is that the process is long and the delays/changes inflicted on the formulation of new or amended regulations by legal advisors in the Privy Council Office are beyond industry's comprehension.

The study team believes more effort needs to be made to negotiate bilateral airworthiness agreements for the benefit of the domestic aircraft and aircraft component manufacturers.

KEY ISSUES

Are the resources allocated to air safety regulation adequate to ensure that the objective is achieved?

Is optimum use made of the carriers and the manufacturers vested interest in conducting safe operations with a safe product?

Is the level of cost recovery commensurate with the expenditure for licensing and certification?

Are safety regulations processed in the shortest possible time having regard for the need to ensure they are within the competence of the aeronautical authority and the overriding need to attend to the safety of the flying public?

Are the necessary bilateral agreements with other aircraft manufacturing countries in place to minimize the costs to Canadian manufacturers of producing aircraft or component parts for export, and of the air carriers in importing these products.

Are airport licensing standards sufficiently detailed to enable their effective use for large non-federally operated airports?

ASSESSMENT

Experience in the United States since the beginning of the transition to economic deregulation has shown quite clearly that a greater burden falls to the safety regulator. Even now, this outcome of economic regulatory reform in Canadian air transportation is being felt by Aeronautical Regulatory Services staff. It is evident that an increase in resources is essential to preserve the integrity of the safety system while providing an acceptable level of service to the aircraft manufacturing and the air carrier industries. Failure to attend to these resource needs in a timely fashion is not an acceptable alternative given the nature of the work carried out under this program, and the commitments being made to economic regulatory reform. It would be a real irony to reduce the burden in one area (economic) and have the delays and difficulties appear in another area (safety regulation). Moreover, if the service is not adequately resourced and managers must cope with competing priorities, there is the potential for pressure being brought to have the staff address industry concerns to the possible detriment of in-flight safety.

Given that responsible air carriers and aircraft manufacturers have a very real stake and a large vested interest in the safety of their product, more use should be made of self-regulation in monitoring compliance with Transport Canada (TC) approved procedures, designs and manufacturing techniques, etc. backed up by TC audits. This would serve to keep the resource needs of Aeronautical Regulatory Services more manageable and be more efficient for industry, while maintaining the overall safety of the system.

Although TC is generally doing a good job in the field of air safety regulation, it is inevitable that, from time to time, disagreements will arise. Accordingly, the study team believes the creation of the Airworthiness Advisory

Board as a mechanism for resolution of disputes is a commendable initiative. Its existence should be made more widely known by advising the major civil aviation associations, ATAC, CBAA, COPA, RCFCA, etc.

The study team is of the view that air safety regulatory services involving licensing, certification and enforcement should be brought closer to the client public. Hence, the team believes that district offices should be opened in every major city in Canada that has a current or potential demand which would make the staffing of such an office cost effective. The team also believes that the resources for this proposal could be obtained by transferring some of the personnel and financial activities now done in regional offices to Ottawa headquarters so as to achieve economies of scale.

There are aircraft operation expenditures related to air safety regulation which could be reduced by making greater use of leased aircraft, contract maintenance for government aircraft, etc.

With respect to cost recovery, just about the time the "6-and-5" program was introduced, the department had a proposal for a major increase in licensing and certification fees in the final stages of implementation. Clearly, this package should be updated to reflect today's costs and introduced as quickly as possible.

There is a very real problem, with definite safety connotations, in the efficient promulgation of new and amended regulations that manifests itself in the bottleneck being created by legal advisors in the Department of Justice attached to the Privy Council Office, who are supposed to ensure proposed regulations conform with the Statutory Instruments Act. It appears that an impasse has been reached that is said to involve such regressive steps as forcing Transport Canada to revert to translation in lieu of simultaneous drafting in both languages with industry consultation on both versions. Clearly this is a very serious matter but it has not been receiving the attention of senior management it deserves because of the many other things going on in Transport Canada. It is suggested that firm policy guidelines be enunciated to the effect that PCO legal staff should:

- confine their activity to a review and commentary and not engage in drafting;

- restrict their review to ensuring that the proposed regulations or amendments are 'intra vires';
- establish reasonable time periods for the completion of their review; and
- only in unusual circumstances comment on material that is resubmitted in response to an earlier review when the issues in that review have been addressed.

There is a need, the study team believes, to continue efforts to negotiate bilateral airworthiness agreements, such as now exist with the United States, with other leading aviation countries such as the United Kingdom and France. It is difficult for the department to devote the personnel to this "non-urgent" task with its present constraints which is another justification for providing additional resources.

It is the study team's opinion that the regulators are not fully aware of the costs to industry of proposed, new or amended regulations. It is the team's view that this information should be provided to the decision maker so that a comprehensive picture is available.

It appears that a thorough review of the airport licensing standards should be undertaken before TC is faced with the requirement to license a major airport to be operated by a non-federal authority.

OPTIONS

The study team recommends to the Task Force that the government consider the following measures:

a. Immediately increase the resources devoted to licensing, certification and enforcement in the regulation of air safety to the levels advocated in the recent A-base review so as to ensure that the travelling public is protected, and that the industry is offered a reasonable level of service having regard for current and proposed economic regulatory reform.

b. Pursue the development of meaningful workload determinants to ensure resources keep pace with requirements.

c. Adopt a fee structure for regulatory services (but not monitoring and enforcement) that reflects the real cost of these services to the federal treasury.

d. Assign dedicated airworthiness inspectors to major air carriers and aircraft manufacturing companies for auditing and on-site consultation.

e. Implement a greater degree of self-regulation for monitoring compliance by delegating the responsibility to competent air carriers and aircraft manufacturers for their activities through certification of staff and procedures thereby reducing the on-going involvement of Transport Canada personnel with those companies to one of on-site presence as proposed in the preceding paragraph and periodic audits.

f. Utilize the Airworthiness Advisory Board to the benefit of all segments of the aviation industry by publicizing its existence and by accepting submissions for redress from any party with a legitimate involvement in civil aviation matters of an airworthiness nature.

g. Expedite the development and promulgation of the new air regulations in support of the new Aeronautics Act.

h. Air carrier regulations (and the proposed air regulations), should submit such regulations for review by the legal staff of the Privy Council only as to the intra-vires of the regulation and not as to its formulation.

i. Comment on proposed regulations by the Department of Justice advisors in the Privy Council Office should be completed normally within 30 working days and exceptionally within 45 working days; and failure to meet these standards should be brought to the attention of the Minister of Justice and the Attorney General in a monthly report.

j. Ensure that all necessary regulations are in place for the effective licensing of large airports irrespective of ownership and management.

k. Develop criteria for the establishment of district offices to serve the aviation industry more efficiently and strive to open new offices as soon as resources can be made available.

l. Make use of the services of commercial general aviation companies for the maintenance and/or provision of aircraft for regulatory inspection purposes.

m. Seek to develop reciprocal airworthiness agreements with other countries engaged in the manufacturing of aircraft and/or major component parts of aircraft.

n. Perform a competent benefit/cost analysis for any new or amended regulation, and except where the proposed regulatory change is to reduce regulation, not promulgate any regulation for which the net benefit to society is not positive.

PROGRAM DESCRIPTIONS AND ASSOCIATED RESOURCES (84/85)

AIR SAFETY REGULATION

Air Carrier Operating Certificates: The department issues safety certificates to commercial air carriers.

PYs = 10   CAP = $473,000   REV = $22,000

Aviation Safety Information: Transport Canada undertakes analytical studies to identify and define aviation safety deficiencies, provides the aviation community with safety-of-flight literature and audiovisual material, educational programs and the services of its regional aviation safety officers.

PYs = 20   O&M = $1,307,000

Civil Aviation Personnel Licencing: The department is responsible for the requirements for issue and endorsement of civil aviation personnel licences.

PYs = 4   O&M = $205,000

Aviation Personnel Licence Study and Reference Guides: Study and reference guides are available for aviation personnel applying to write examinations.

PYs = 1   O&M = $19,000

Flight Instructor Courses: Refresher courses are offered to civil flight instructors.

PYs = 2   O&M = $94,000   TRANSFERS = $72,000

Flight Crew and AME Licensing: Written examinations for licensing of pilots and aircraft engineers may be taken by qualified applicants through regional offices and some sub-offices.

PYs = 4   O&M = $168,000   TRANSFERS = $10,000

Civil Aircraft Register: The department publishes the civil aircraft register of ownership (names and addresses) quarterly in two volumes. A list can be produced monthly for a nominal fee.

PYs = 8 CAP = $52,000 O&M = $194,000

Aeronautical Information Service: The department provides printed information on aeronautical rules and regulations, procedures, airspace, airports, navigation and communication facilities, services, maps and aeronautical charts, hazards, and other information used by pilots for pre-flight planning and in-flight navigation.

PYs = 29 O&M = $2,010,000

Air Regulations Enforcement: The department is responsible for deterring violations of the Air Regulations and Air Navigation Orders through warnings, license suspensions, and prosecutions.

PYs = 34 CAP = $1,501,000 O&M = $19,883,000

Airworthiness/Aircraft: The department, inter alia, is responsible for standards, procedures, and approval of aircraft, engine, and aeronautical product design; the issuance of certificates of airworthiness, flight permits, and other flight authorizations. It also issues airworthiness directives and other airworthiness information, and design and maintenance requirements and procedures required by the Air Regulations and Air Navigation Orders.

PYs = 272 O&M = $12,323,000 REVENUES = $84,000

Balloon Launching Regulation: Manned and unmanned balloons are controlled in accordance with Canadian Air Regulation 511.

PYs = 0.1 O&M = $5,000

Flight Test Standards and Guides: The department sets flight test guides for fixed and rotary wing pilot license applicants obtaining private or commercial licenses, and for multi-engine endorsement applicants.

PYs = 0.5 O&M = $90,000*
* (Salaries/Wages only, other O&M not specified.)

Aircraft Registration: The department provides information for co-owners of registered Canadian aircraft. Records of flying times and aircraft serviceability are maintained in accordance with Canadian Air Regulation.

PYs = 14   O&M = $383,000

CIVIL AVIATION MEDICINE

DESCRIPTION

Civil Aviation Medicine of Health and Welfare Canada provides advice and assistance to the Department of Transport on all aviation medicine matters, including: medical exmination of civilian aircrew and air traffic controllers; assessment of health hazards to aircrew; development of medical standards for aviation personnel; participation in aircraft accident investigations; education and research.

AUTHORITY

The Aeronautics Act and Health and Welfare Canada's Main Estimates.

OBJECTIVES

The principal objective of the program is to ensure that civil aviation aircraft are flown and controlled by healthy aircrews and air traffic controllers.

BENEFICIARIES

Contributes to the safe operation of civil aviation in Canada. The principal beneficiaries are the civil aviation carriers, general aviation, air travellers and the general public.

EXPENDITURES (84/85)	**($000)**
CAP	60
O&M	2,454
Transfer	-
Total	2,514
Revenue	-
Net Cost	2,514
Person-years	49

OBSERVATIONS

There are approximately 78,000 aeronautical licence holders in Canada, each of whom requires some form of medical examination to retain their licence. Additionally, about 8,500 individuals annually commence training leading to an aeronautical licence, and each of them must have a medical examination before a licence can be issued. Because the various licences are for differing validity periods, in total there is a requirement for some 66,000 medical examinations annually.

The medical examinations are done by civil aviation medical examiners, doctors appointed across Canada by Transport Canada (TC) on the advice of Health and Welfare Canada (HWC). There are approximately 850 examiners available to accommodate local needs.

Currently, civil aviation medical examiners do not have to have specialized aviation knowledge, are not required to take any training while holding the appointment, and are not subject to mandatory quality reviews to retain their appointments. In fact, at the present time it is claimed that Canada cannot meet training standards for civil aviation medical examiners being proposed by the International Civil Aviation Organization for third-world countries. HWC is aware of the need to address these deficiencies and intends to do so through an enhanced training program subject to the availability of resources.

In the past 40 years, aviation medical services have been provided to TC almost exclusively by HWC. This relationship was fundamentally affected by the formation of the Canadian Aviation Safety Board (CASB) in 1984, which resulted in TC losing the responsibility for civil aviation accident investigation. It appears that the implications of this change for civil aviation medicine were never fully explored and resolved before the event, and consequently a major study had to be undertaken after the creation of the CASB to identify the civil aviation medicine service requirements of the CASB, TC and HWC.

Findings of the "Interdepartmental Task Force on Civil Aviation Medical Services Required by the Federal Government" are now documented in a report that calls for an increase in person-years of 29, from 49 to 78, and an increase in O&M funds of about 50 per cent. The study points out that "the foregoing recommended resource base represents $49 for each of the 78,000 licenced aviation personnel ($32 each in fiscal year 1984/85), or $38,450 for each fatal or serious injury accident (there are approximately 100 annually)" and that "the recommended resource base for aviation medicine represents only .005 of the total federal civil aviation budget". Nonetheless, it is a substantial increase in resources for this activity. Given the nature of the study, it is surprising that Treasury Board Canada (TBC) was not represented, although it is noted that analysts of the board reviewed and presumably approved the the program methodology and workplan for the study.

The civil aviation medical service to TC consists of:

- an assessment program to assess and advise on the medical examination of civilian air crews and air traffic controllers for licencing purposes;
- an assessment program to assess health hazards to air crews, and develop medical standards for aviation personnel;
- an education program to provide education for all air crews and examiners on aero-medical matters; and
- a research and development program to coordinate and execute research and development to improve aero-medical aspects of aviation safety.

In addition, HWC has agreed through a Memorandum of Understanding to provide medical investigative and laboratory support services for aircraft accident investigations during an "interim" period.

When the CASB was formed, three person-years were transferred from HWC to the CASB. It appears to have been assumed at that time that HWC would continue to do the fact-finding i.e. on-site investigations and laboratory analysis, in support of accident investigation. If the additional resources identified as required by CASB to fulfill its mandate in a totally independent fashion were taken out of the current resource allocation to HWC, it would have a severe impact on the ability of HWC to conduct its other functions, and consequently would lead to a drastic lowering in the level of service to civil aviation personnel who need to be licensed, and to the industry that needs licensed personnel.

A peripheral issue is the location of the Civil Aviation Medical Unit (CAMU) which HWC believes should be relocated to Ottawa (now in Toronto) for three primary reasons:

a. So that its efforts can be more closely integrated with those of the HWC occupational health laboratory, recognizing that civil aviation medicine is a sub-set of occupational medicine.

b. So that the unit can be in closer proximity to and therefore have improved communications with the CASB.

c. To give the CAMU adequate laboratory facilities for their tasks.

It should be noted that within the aforementioned proposed increase in HWC requirements, provision was made for a 100-per-cent increase in the resourcing of the CAMU, i.e. from five to 10 person-years.

It appears to the study team that the recommendation of the Commission of Inquiry on Aviation Safety #203 has not been pursued as vigorously as it could have been.

KEY ISSUES

Does the mandate of the CASB require a totally independent medical capability such that they could not use the facilities of the CAMU for laboratory analysis nor the staff of HWC for fact-finding (on-site investigations)?

Are the resources allocated to the civil aviation medicine program adequate?

Should the CAMU be relocated to Ottawa?

Should civil aviation medicine training facilities be provided by the federal government?

ASSESSMENT

In the view of the study team it would seem that the fact-finding aspects of an accident investigation should continue to be delegated to HWC with a minimal core group in the CASB to:

- ensure that doctors for the investigative phase are selected by HWC so as to avoid real or perceived conflicts of interest situations, e.g. by ensuring that doctors from regions other than those in which the aircrew or the air traffic controllers were examined are selected;

- conduct the assessment phase of the accident investigation and formulate recommendations for the CASB; and

- act as expert advisors to the CASB.

If this approach were not adopted, the results will be two-fold:

- additional resources, person-years and materiel (for a duplicate laboratory) will be required; and

- the potential cross-fertilization of staff between assessment and accident investigation will be lost or significantly impaired.

In addition, some concern has been raised about the career progression of doctors who join the CASB and the difficulty they will have in being productively utilized because of the uncertain, sporadic workload inherent in accident investigation.

The case for additional resources in support of civil aviation medicine seems well made and this issue should, the study team believes, be addressed on an urgent basis. As the operational capability of aircraft engines and the structural design of aircraft continue to contribute to enhanced aviation safety, it seems inevitable that the weak link will be the human factor aspect of aircraft operations. Indeed, a recent analysis of U.S. air accidents appears to make this very point. Consequently, there is a need to ensure that this aspect receives the attention it deserves for the protection of the air travelling public.

There appears to be considerable merit in relocating the CAMU to Ottawa and to providing or seeing to the provision of decompression training units across Canada.

Specifically:

a. The person-year allocation should be sufficient to provide staff for proper training of civil aviation medical examiners so as to implement and operate the computerized medical assessment system.

b. Provision should be made for the staffing of a doctor devoted to aviation safety in the HWC headquarters.

c. The CAMU should be relocated to Ottawa and adequate resources for the CAMU be approved to enable it to support the CASB.

d. Provision should be made for the construction, on a cost recoverable basis from users, of an appropriate number of decompression training facilities across Canada.

Based on the information available, it is suggested that through the judicious use of contracting out as well as hiring term and part-time employees in the regions, the regional base should be adequate at 24 person-years (against 29 person-years now available without the computerized medical assessment system and 25 person-years proposed in the interdepartmental study), HWC civil aviation medicine headquarters base at 24 person-years (against 21 person-years used now, of which six are at a risk, and 27 person-years proposed) and the CAMU base at eight person-years (against five now and 10 proposed). Insofar as the CASB is concerned, until experience demonstrates otherwise, and assuming the principles in the foregoing paragraphs are accepted, the resource increase could be held to two person-years, i.e. from three to five person-years, and these should be new person-years and not transfers from HWC.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Communicating to the Chairman of the CASB the conviction that more use of HWC civil aviation medicine resources in the investigative or fact-finding phase of accident investigation will be necessary because of resource limitations, and that this can and should be done in a manner that will not compromise the independence of the CASB.

2. The merits of relocating the CAMU to Ottawa giving particular attention to the advantages this would have in enabling the CAMU to fulfill the laboratory needs of the CASB.

3. Agreement in principle on the human resource needs of civil aviation medicine and provide for those needs from within the Department of Transport's Reference Level by reallocating savings from the policy and administrative overhead.

4. Addressing, on an urgent basis, the facilities needed for adequate training of commercial, corporate and government aircrew with a view to ensuring that such training necessities as decompression chambers are available through the private sector, or from the federal government on a cost recoverable basis.

MARINE SAFETY REGULATION - LARGE VESSELS

DESCRIPTION

Ship Pollution Regulations
Ship Electronic Equipment
Ships Survival Equipment
Marine Regulation Publications
Air Cushion Vehicle Regulation
Ship Regulation
Ship Radio Inspection Regulations
Navigable Waters Protection

Annex B contains individual program descriptions.

AUTHORITY

The Canada Shipping Act and International Conventions require that Canada certify vessels as being seaworthy and having proper navigational and safety equipment.

OBJECTIVES

To meet international agreements and to ensure the safe operation of vessels.

BENEFICIARIES

Ship owners and crews and the boating public.

EXPENDITURES (85/86)[1]	**($000)**
CAP	1,917
O&M	21,473
Transfer	15
Total	23,405
Revenue	2,950
Net Cost	20,455
% Cost Recovery	13
Person-years	386 [2]

[1] These resources represent expenditures for both large and small vessels.

[2] Includes three person-years in the Aircraft Services Activity in support of Marine Safety Regulation.

Note: This program profile should be read in conjunction with Marine Safety Regulation - Small Vessels.

The Canadian merchant fleet consists of 1,300 vessels over 100 grt. The seagoing fleet totals 1,031 vessels, of which 822 are under 1,000 grt. Approximately 400 vessels are maintained in class.

OBSERVATIONS

Industry is of the view that regulations based on performance specifications rather than technical specifications would reduce vessel construction costs, as well as retrofit and equipment costs.

Industry also suggested that the Canadian Coast Guard (CCG) should make use of the technique of benefit/cost analysis to test the validity of new or amended marine safety regulations, particularly when the proposed regulations are internally generated or emanate from inquiries.

Safety inspection (i.e. lifeboats and firefighting) is carried out by Canada Steamship Inspection (CSI) although in some countries, it has been delegated to classification societies.

Hull and machinery and safety inspection is carried out by CSI for all vessels over 15 tonnes. Electronic equipment inspection is carried out by CCG. Radio inspection is carried out by the Department of Communications on behalf of CCG.

Classification societies are international organizations that set design and construction standards for the hulls and machinery of ships. These standards are accepted internationally by many maritime nations and by marine insurance companies, although there is no formal relationship between classification societies and insurance companies. The classification societies also periodically inspect ships against these standards, and if accepted, a ship is considered to remain "in class".

Although international in operation, classification societies are associated with a home country. The four most commonly used classification societies in Canada are Lloyds Register, American Bureau of Shipping, Det Norske Veritas, and Bureau Veritas.

Almost all large vessels, including CCG and large fishing vessels, are designed and built to classification society standards (class). Many remain in class after being built. Being in class makes it easier to secure cargo, reduces insurance premiums and makes for higher resale value. For tug boats, it is a necessary condition for employment by the Salvage Association.

Although the Ship Safety Branch of CSI must approve new vessel construction, the branch does not appear to have independent ship construction standards; approval is on the basis of class specifications. It is noteworthy that the classification societies are world leaders in this area.

Both class and CSI inspectors are present in Canadian shipyards if the vessel is being built to class although class and CSI requirements are not always the same. Also, class inspectors respond more quickly than do CSI inspectors.

Discussions have taken place between the CCG and classification societies concerning the proposed transfer of authority for hull and machinery inspections from CSI to designated classification societies although no agreement has been reached.

Some shipowners object to the duplication of inspection of new ship construction in shipyards. Shipyards feel that CSI inspection is redundant and that it creates delays with resultant cost increases. Shipyards are generally satisfied with the performance of the on-site inspector but problems arise when headquarters approval must be sought. The approval process is considered so complex that some smaller shipowners employ consultants to shepherd approval through CSI.

Most owners having ships built in foreign yards have the vessels inspected by CSI during building to avoid delays when the ships are registered in Canada. The out-of-pocket expenses of CSI in these cases are paid by the owner.

Shipping lines are concerned with the duplication of ongoing inspection for vessels which are kept in class. Although the cost assessed by CSI is small and this is not a factor, time out of service is a major concern. For example, there is sometimes a problem in getting ships to sea because CSI doesn't have sufficient funds in its budget to pay for overtime. Even if the shipyard or the shipping company offers to pay, it doesn't help as there is no mechanism for crediting these funds to the CSI budget.

A smaller percentage of inspection costs is being recovered today than was the case in the past. Fees can be increased but if there is to be full cost recovery, both the cost and the out-of-service time will be major concerns.

Both CSI and class societies grant extensions for the periodic or ongoing inspections.

CSI inspection of engine components should be based on operating time, rather than fixed schedule.

CSI inspection is not consistent place to place, or between operators and some lines will hesitate to put a vessel in for repairs in certain yards because of the idiosyncracies of a particular CSI inspector.

Insurance can be obtained for almost any vessel, at a price. Rates are a function of loss record (ownership), trade, age and class. In the short term, premiums cannot influence maintenance standards. An inspection by CSI is not taken into account in setting insurance rates: inspection by class is. If a ship is not in class, the insurance company may employ an independent surveyor.

No commercial Canadian vessel would put to sea unless its radio and navigational equipment were operational.

Government radio or electronic inspectors only determine if equipment is working properly; service companies on the other hand repair equipment they find is not working.

KEY ISSUES

Should marine safety regulations be based on performance specifications rather than detailed technical specifications?

Is there duplication of hull and machinery inspection, both for new construction and for ongoing inspections?

Could radio and electronic inspection be carried out more cost-effectively by private interests?

ASSESSMENT

The study team is of the opinion that the conversion of regulations from technical specifications to performance specifications should proceed on a priority basis consistent with Canada's international obligations.

The study team is also of the view that safety inspections are necessary and should periodically be carried out by CSI.

There is duplication of hull and machinery inspection and this places an unnecessary burden on shipping. Almost all major maritime nations have classification societies carry out hull and machinery inspections on their behalf. It is the view of the study team that it is practical to adopt this approach in Canada. Moreover, authorization of classification societies to carry out hull and machinery inspection and safety inspection should result in a reduction in CSI person-years of 85 by 1988 with a further 40 person-year reduction between 1988 and 1990.

The study team suggests that the CSI schedule of fees be increased to recover a substantially greater proportion of the costs.

It is the study team's view that radio and electronic inspections could be carried out by certified technicians who currently keep the equipment in repair.

OPTIONS

Consequently, the study team recommends to the Task Force that the government consider the following measures:

1. The Marine Safety Advisory Council continue to provide input to Transport Canada with respect to the transfer of inspection to private organizations.

2. Increase fees for hull and machinery inspection and for safety inspection over the next few years to recover all departmental costs.

3. Where industry is prepared to pay the extra cost, make provision for CSI inspectors to be available outside normal working hours.

4. Perform a competent benefit/cost analysis for any new or amended regulation, and except where the proposed regulatory change is to reduce regulation, not promulgate any regulation for which there is no net benefit to society.

5. Develop explicit work plans to convert regulations from technical specifications to performance specifications taking into account Canada's international obligations and the need for enabling legislation.

6. As a matter of priority, amend the Canada Shipping Act to enable the classification societies to be delegated the power to carry out hull and machinery inspections on behalf of CSI. Following passage of the necessary legislation, hull and machinery inspection should be transferred to the classification societies if the ship is built to class and maintained in class.

7. Investigate the possibility of classification societies inspecting the hull and machinery for vessels which are not in class and if appropriate, transfer this responsibility.

8. Amend the Canada Shipping Act to allow the classification societies to carry out safety inspection (equipment and emergency procedures) on behalf of CSI to standards established by CSI. A shipowner would have the right to select either CSI or class inspection. CSI should retain the right to conduct a safety inspection from time to time, even when a valid inspection had been conducted by the classification society.

9. Make provision for radio and electronic inspections to be conducted on behalf of Transport Canada by certified technicians in private firms.

10. Make the licensing of large Canadian vessels mandatory, and establish an appropriate fee to defray part of the cost of search and rescue, aids to navigation and safety educational programs.

MARINE SAFETY REGULATION - LARGE VESSELS

PROGRAM DESCRIPTIONS AND ASSOCIATED RESOURCES (84/85)

Ship Pollution Regulations: The Coast Guard is responsible for the administration and enforcement of regulations to control or prohibit the discharge of oil, garbage, and other pollutants from ships into Canadian waters and fishing zones.

PYs = 15 O&M = $959,000

Ship Electronic Equipment: The Coast Guard is responsible for the administration of regulations and standards concerning the performance characteristics, inspection, and installation of shipborne electronic equipment used for communications and navigation.

Resources subsumed under Ship Regulation.

Ships Survival Equipment: The Coast Guard is responsible for the standards and inspection of survival systems and lifesaving equipment and emergency safety operations and procedures on passenger and other commercial vessels and on marine offshore drilling units; for safe working practices on ships; and for cargo-handling equipment on ships.

Resources subsumed under Ship Regulation.

Marine Regulation Publications: A pocket-size, consolidated publication of the Canada Shipping Act and Regulations, including an amendment service, has been developed for the marine industry and is now available to the private sector.

O&M = $28,000 REVENUE = $15,000

Air Cushion Vehicle Regulation: The Coast Guard administers standards relating to the design and construction of air cushion vehicles, approves designs, establishes safety certification criteria, and inspects and certifies air cushion vehicles. The Coast Guard enforces regulations pertaining to the licensing of air cushion vehicle operators and maintenance engineers.

PYs = 2 O&M = $201,000

Ship Regulation: The administration of the Canada Shipping Act and the Arctic Waters Pollution Prevention Act through the development, promulgation and enforcement of policies, regulations and standards relating to seaworthiness, by inspecting and certifying ships and oil-drilling rigs (including their installations and emergency and survival equipment), and cargoes including dangerous and hazardous goods, and the registration of ships.

PYs = 336 CAP = $958,000
O&M = $17,616,000 TRANSFERS = $ 15,000
REV = $ 2,650,000

Note - Also subsumes Small Vessels Regulation.

Ship Radio Inspection Regulations: The Coast Guard is responsible for the inspection and certification of ships required to carry radio equipment by regulations made under the Canada Shipping Act. It is also responsible for the administration of regulations and standards concerning the performance characteristics, inspection, and installation of shipborne electronic equipment used for communications and navigation.

PYs = 2 O&M = $791,000
REVENUE = $300,000

Navigable Waters Protection: Under the Navigable Waters Protection Act, the Coast Guard is responsible for the protection of the public right of navigation by ensuring the review, analysis and approval of works (bridges, dams, wharves, overhead and submarine power and telephone cables, etc.) constructed in navigable waters, the removal of wrecked vessels, and the investigation of incidents of obstruction to navigation. Under the Canada Shipping Act, this function is also responsible for the administration of Receiver of Wreck activities, which provides for the preservation, protection and disposal of wreck and wrecked vessels in the absence of the rightful owner.

PYs = 28 O&M = $1,906,000

MARINE SAFETY REGULATION - SMALL VESSELS

DESCRIPTION

Small Vessel Regulations Program of the Canadian Coast Guard (CCG) is responsible for the administration of small vessel regulations, including calculation of safe-load and engine power ratings, standards for small vessel construction, the issue of construction compliance decals and capacity plates, the regulation of safety equipment for small vessels, restricted waters regulations, and the approval of lifejackets and personal flotation devices.

Resources are subsumed in Ship Regulation.

AUTHORITY

Canada Shipping Act - Small Vessel Regulations

OBJECTIVES

To ensure the safe operation of small vessels.

BENEFICIARIES

Ship owners and crews and the boating public.

EXPENDITURES (85/86)[1]	**($000)**
CAP	1,917
O&M	21,473
Transfer	15
Total	23,405
Revenue	2,950
Net Cost	20,455
% Cost Recovery	13
Person-years	386 [2]

[1] These resources represent expenditures for both large and small vessels.

[2] Includes three person-years in the Aircraft Services Activity in support of Marine Safety Regulation.

Note: This program profile should be read in conjunction with Marine Safety Regulation - Large Vessels and Marine Search and Rescue.

OBSERVATIONS

In the view of the study team, it is important that small boating regulation remain with the federal government otherwise there will be a multiplicity of regulatory authorities and the probability of uneven regulation.

The qualifications and experience of most of the present CSI inspectors make them unsuitable for dealing with small vessels (i.e. pleasure craft).

A problem could be created in setting the standards for small passenger vessels if they were to interfere with the chartering of pleasure craft.

Approval of small vessel design is an appropriate means of ensuring vessel safety but it does not necessarily have to be carried out by Transport Canada (TC).

The voluntary system of self-regulation by the individual boat builder is not working well. The setting of small vessel construction standards and enforcement by an industry association is a practical alternative.

The voluntary inspection of the safety equipment of small vessels by the Canadian Marine Rescue Auxiliary (CMRA) is very useful.

The insurance industry in the medium term (i.e. 10 years), is not an adequate mechanism to ensure the seaworthiness or proper equipping of small vessels. Indeed, boat insurance is now often part of the household insurance package. Experience and training of an operator is rarely considered in setting small boat insurance rates. The proper training of owners and operators would greatly reduce boating accidents.

Only a small proportion of small boats are registered and/or licensed. Licensing of small boat operators is opposed by the boating public who advise it would have little or no positive effect and would be difficult to implement.

Communication between the small boat community and TC is improving. Because of this, it has been suggested that now is not the time to change small boating regulation.

KEY ISSUES

How can the safety of small vessels be most cost-effectively accomplished?

ASSESSMENT

The regulation of small craft should continue to be a federal responsibility. The study team has concluded that small craft construction standards should be set by a private organization (industry association) on behalf of TC.

The study team is also of the view that the CCG could make use of benefit/cost analysis to test the validity of new or amended marine safety regulations, particularly when the proposed regulations are internally generated or emanate from inquiries.

The most cost-effective way to reduce boating accidents and the cost of search and rescue (SAR) is through education of the operator, voluntary inspection by non-Coast Guard personnel and coordination of activities with provincial and local police forces.

As proper training of the small boat operator can reduce the cost of SAR, training should be funded in part by TC but carried out primarily by private organizations.

The system of registration and/or licensing of small boats should, the study team believes, be improved and made mandatory with an appropriate fee to help offset the costs of educational programs in safety and of SAR.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Increasing the funding for private organizations to train the operators of small boats, and to provide voluntary inspection of safety equipment on small boats.

2. Undertaking a competent benefit/cost analysis on any new or amended regulation, and except where the proposed regulatory change will result in reduced regulation, not promulgate any proposed regulation for which the net benefit to society is not positive.

3. Giving the responsibility to a private sector organization (industry association) for developing safety standards for small vessels and for determining that new vessels meet these standards, with periodic compliance audits by the department.

4. Making licensing of small Canadian vessels mandatory, and establishing an appropriate fee to defray part of the costs of search and rescue, aids to navigation and safety educational programs.

MARINE SAFETY REGULATION - PERSONNEL CERTIFICATION

DESCRIPTION

Marine Engineers/Examination: The Coast Guard awards Certificates of Competency for engineers on ships registered in Canada.

Masters, Mates and Crews/Examination: The Coast Guard is responsible for the service, training, and examination requirements for masters, mates, and crews of ships registered in Canada.

Personnel Regulation -- Marine Engineers/Examination: The Coast Guard awards Certificates of Competency for engineers on ships registered in Canada.

AUTHORITY

Canada Shipping Act. Certification of crews is necessary for both safe operation and for recognition in foreign countries.

OBJECTIVES

To meet international obligation and to ensure the safe operation of vessels.

BENEFICIARIES

Canadian flag shipping lines and ships crews including masters, mates and engineers.

EXPENDITURES (85/86)	**($000)**
CAP	100
O&M	2,637
Transfer	14
Total	2,751
Revenue	1,050
Net Cost	1,701
% Cost Recovery	38
Person-years	50

Note: This profile should be read in conjunction with Transportation Training.

OBSERVATIONS

The Canadian Coast Guard (CCG) sets the curriculum and training standards for certification of marine personnel. Classroom training is carried out by the CCG at the Transport Canada Training Institute (TCTI) and by provincial schools across Canada. Examinations are set and conducted by staff of the Ship Safety Branch, at numerous locations across the country. Students must defray the cost of tuition, travel, room and board, and examination.

The CCG officers conduct examinations more or less on the basis of demand. This enables the student to return home or to work more quickly, thus reducing his or her cost. At the same time however, this practice results in somewhat higher costs to the CCG.

A computerized examination question bank, established by CCG in conjunction with provincial schools, would reduce CCG's costs of setting and conducting examinations. Written examinations could be invigilated by a responsible person.

Examinations are heavily subsidized to the benefit of private ship operators and personnel as well as the crews of fishing vessels. Full cost recovery for examinations would reduce the number writing to those who are properly prepared.

Fishing industry certification is below that of the shipping industry generally. Some fishing industry representatives have expressed concern with this as far as off-shore fishing is concerned.

At present, availability of trained navigation personnel is not a problem.

There is a bottleneck in the training of engineers created by the inability to get the required sea-time combined with the difficulty of the course (fourth to third class).

Education is a provincial responsibility. School officials believe there are too many schools in Canada with a surplus capacity. Furthermore, with the present downturn in shipping, there aren't enough ships to provide training to young people wishing to become cadets.

The provincial schools maintain that federal government training is not cost effective and that it can be done by provincial schools at substantially lower cost.

Transport Canada has contributed equipment in the past to provincial schools through the National Advisory Council on Marine Training (NACMT) program. Although this program was discontinued some two years ago, there have been some efforts within the department to have it reinstituted.

There is liaison between CCG and the schools on education, and between the CCG and industry on personnel requirements.

The CCG and National Defence (DND) maintain training, examination and certification of their personnel separate from commercial shipping.

KEY ISSUES

Are we training an adequate number of people with the proper qualifications?

Are the costs to the CCG of training and certification reasonable?

ASSESSMENT

In the view of the study team, there should be increased cost recovery for marine personnel certification.

The certification system would be more effective if questions were selected from an agreed upon bank of examination questions and if fees for examinations were substantially increased. Any new system of examinations should not result, per se, in a large cost increase for individual candidates.

There should be greater flexibility in the administration of sea-time provisions to allow personnel to take more advanced courses with less sea-time required.

The requirements for engineers should, the study team believes, be restructured to permit more course time involving practical training on-shore in lieu of sea-time.

CCG and DND should continue to certify their personnel separately from industry.

The fishing industry would benefit if certification of personnel on off-shore vessels were brought into line with the shipping industry.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Increasing examination fees over a four-year period to achieve full cost recovery for its marine personnel certification activity.
2. A data bank of examination questions be established jointly between the CCG and provincial schools.
3. Ending the program of supplying capital equipment to provincial schools.
4. Where cost-effective, marine training of Coast Guard personnel, other than officers, be carried out by provincial colleges or private institutions.
5. Reviewing the curriculum of engineering officers to ensure that the requirements do not unnecessarily impede candidates from successfully completing the higher qualifications so that vessels can be staffed by adequately trained Canadians.
6. Exploring the merits of bringing fishing industry certification for off-shore fishing vessels (large trawlers) more in line with commercial shipping.

MARINE SAFETY REGULATION - EMERGENCIES NON-SAR

DESCRIPTION

Marine Emergencies (Non-SAR): The Coast Guard responds to non-search-and-rescue marine emergencies, particularly oil spills.

Maritime Pollution Claims Fund: Established under the Canada Shipping Act to provide for compensation to an individual who suffers any damage or loss of income from an oil spill that cannot be legally recovered from the owner of the responsible ship. A notice of claim for damage or loss can be submitted to the Administrator, Maritime Pollution Claims Fund.

Note: There is no budget allocation as any payments required would be made from the Claims Fund. The fund had $40 million when contributions were discontinued in 1976. The current balance is approximately $103 million.

AUTHORITY

Canada Shipping Act, Part XX, Arctic Waters Pollution Prevention Act.

OBJECTIVES

To ensure the clean-up of pollution from shipping and to act as a resource for marine pollution incidents from other sources.

BENEFICIARIES

The benefits include increased protection of the marine environment through rapid response to marine pollution incidents.

The beneficiaries include fishermen, residents of coastal and inland lake areas, Canadian and foreign shipping lines, and the oil industry.

EXPENDITURES (85/86)	**($000)**
CAP	1,455
O&M	6,660[2]
Transfer	-
Total	8,115
Revenue	-
Net Cost	8,115
Person-years	53[1]

[1] The eight person-years at Mulgrave are not involved in emergency tasks.

[2] This amount includes approximately $3 million for standby emergency purpose use only. This has not been spent in the last three years.

OBSERVATIONS

Environment Canada has no direct program for marine pollution clean-up, but provides some support to the Canadian Coast Guard (CCG) in the form of technical advice, and has a small research capability.

In the case of a major oil spill, the source can usually be readily identified. The source, however, is much more difficult to ascertain for small spills in open waters.

Where the source of a spill is known, responsibility can usually be set. It is not uncommon, however, for a ship to be the only asset of a company; thus it is often difficult to recover damages or clean-up costs.

No levies are currently being assessed under the Maritime Pollution Claims Fund. However, because it is a fund of last resort, no appreciable amount has been paid out.

CCG maintains shore-based men and equipment at a number of centres across Canada (11 manned/43 unmanned) standing by to combat oil spills. This group also trains CCG and other personnel in cleaning up oil spills and undertakes equipment maintenance. Supervisory personnel and equipment are supplied to industry to clean up oil spills. Out-of-pocket costs and equipment rentals associated with this activity are charged against the party requiring assistance.

Liaison is maintained with PACE (Petroleum Association for Conservation of the Environment), an industry group, and a national response plan to a marine disaster has been jointly developed.

U.S. law requires oil tankers to carry insurance adequate to clean up any oil spill. This is not possible in Canada until the Canada Shipping Act (CSA) is amended.

Replacement value of Transport Canada clean-up equipment is $30 million.

Except in Montreal, private firms do not own sufficient equipment to combat a major spill, currently defined as over 10,000 barrels. If shipping lines were required to contract for clean-up, private firms might be prepared to invest in clean-up equipment.

The Transportation of Dangerous Goods Directorate is not involved in the clean-up of marine spills.

KEY ISSUES

Should Transport Canada maintain a response capability?

Should the oil industry defray some part of cost?

ASSESSMENT

In the view of the study team, the federal government should continue to have the responsibility and authority to order clean-up of oil spills. The government would be required in some instances to authorize clean-up and to be responsible for costs when the source of the spill could not be determined.

Although it is necessary for government to maintain a response capability for major oil spills, industry should, the study team believes, maintain a capability to deal with larger spills than it currently does.

CCG should continue to train their personnel to combat major oil spills so long as it is more cost-effective than private training.

The cost of the response system should be borne in part from equipment rentals, in part from the claims fund and in part by the petroleum industry from a levy on marine movements of oil and petrochemicals. The total cost of the program should be recovered the study team believes.

The private sector could take on increased responsibility for pollution clean-up in many parts of the country. However, the cost of the necessary specialized equipment may be an inhibiting factor. This could be minimized by having equipment available for rental on a cost recovery basis.

The study team is of the opinion that the program person-years should be reduced by 20 per cent, through increased private warehousing, contracting out equipment maintenance, double tasking personnel, and using term and casual employees.

Transport Canada should also recover all its costs for this program from equipment rentals, from the proposed assessment on petro-chemical shippers, and from interest paid on the claims fund.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Reducing the resources for this program by 20 per cent through having the private sector take on responsibility for cleaning up any spills of less than 30,000 barrels; through increased use of private warehousing and contracting out equipment maintenance where cost effective; through double tasking of Canadian Coast Guard personnel; and by making use of term or casual employees.
2. Increasing the rental charges for equipment supplied to clean up spills so as to recover all depreciation and maintenance costs.
3. Putting in place an assessment on the movement of petroleum and chemicals by water, sufficient to cover part of the cost of this program.
4. Amending the Canada Shipping Act to allow interest from the Petroleum Pollution Claims fund to be used to offset the remaining cost of the emergency response program, and requiring oil tankers to carry insurance adequate to cover the costs of cleaning up any oil spill.

SURFACE SAFETY REGULATION - RAIL

DESCRIPTION

The development and enforcement of safety regulations, standards and procedures for railway operations, equipment and infrastructure; and the administration of contributions towards safety improvements at railway/highway crossings at grade.

AUTHORITY

The National Transportation Act requires the Canadian Transport Commission (CTC) to regulate transportation while the Railway Act requires the CTC to monitor railway equipment, operations and services, to promote safety.

OBJECTIVES

To regulate the safety of railway transport services in Canada, so that they are operated in a manner that minimizes the risk of personal injury and property damage.

BENEFICIARIES

Railway companies, railway employees, the travelling public, the public at large, railway and public property owners all benefit from this program. The benefits include the safe and expeditious movement of passengers and goods, the protection of life and property, quality control of equipment, infrastructure and operations and monitoring of the movement of dangerous goods.

EXPENDITURES (85/86)	**($000)**
CAP	15
O&M	8,930
Transfer	10,000
Total	18,945
Revenue	-
Net Cost	18,945
Person-years	154

OBSERVATIONS

Note: This profile should be read in conjunction with the Accident Investigation and Inspector General Transportation Safety Profile.

The Rail Safety program activities include: accident reporting and investigation; standards; performance monitoring of operations, rolling stock, and track; and the transport of dangerous goods. In addition, contribution to railway crossings are funded under this program.

The proposed departmental reorganization shows Railway Safety Regulation as a responsibility of the Assistant Deputy Minister Surface with "Rail" as one of the elements in the Accident Investigation Organization reporting to the Minister.

CP Rail and CN Rail have excellent safety records. In 1984, CP Rail had the lowest and CN had the fourth lowest accident rate among North American railways in their class.

The Rail Safety Advisory Committee is comprised of the regulator, (Railway Transport Committee [RTC]), the carriers (CN, CP, and the Railway Association of Canada to represent other roads), and labour (CRLA). It provides a forum through which regulations can be developed as a joint effort. Participants are generally satisfied with the process except for the length of time taken to promulgate new or amended regulations.

Performance specifications enable a company, within a regulated industry, to select the method of complying with a regulatory requirement which best satisfies their particular situation. Thus each company can tailor its technical specifications to its own special circumstances.

The use of performance specifications rather than detailed technical specifications is consistent with Transport Canada's preferred approach as reflected in "Corporate Priorities".

The legal advisors at the Privy Council often construe the Statutory Instruments Act in such a way as to change the intent of proposed safety regulations whose principles have been agreed upon by both the railways and the CTC. This is frustrating at the present time.

The public interest is protected by allowing the Commission to hold public hearings on contentious regulatory issues.

Accident investigation must be conducted by staff who are knowledgeable about railway operations and engineering. Separation of the regulatory inspection staff from the accident investigation staff may result in increased costs.

Duplication of carrier accident investigation by the RTC serves little purpose for the majority of accidents. Major occurrences will probably always be investigated through the use of public hearings. The low level ($750) of damage which defines a reportable accident results in unnecessary paperwork.

The RTC accepts and adopts the design standards of the American Association of Railroads for rolling stock (other than motive power) and cars used for the transport of dangerous goods.

Approval of bridge designs and track layout at RTC serves little purpose.

Training and certification of railway personnel is primarily the responsibility of railways although the RTC feels obliged to review and approve the programs.

According to the Railway Relocation and Crossings Act (RRCA), the federal government can contribute up to 80 per cent of the capital cost of equipment at grade crossings. In practice, the CTC has interpreted this so that the costs are shared by the CTC (80 per cent), the road authority which can be the municipality or province (12.5 per cent) and the railway (7.5 per cent). Maintenance costs are shared on a 50-50 basis by the railway and the road authority.

KEY ISSUES

Should the regulation of rail safety be based on performance specifications in lieu of technical specifications?

Is safety at railway grade crossings given the appropriate level of attention in the current institutional arrangement?

ASSESSMENT

In the view of the study team, rail safety regulations could be rewritten in terms of performance specifications and these specifications correlated to the reduced level of risk to employees, the public and the environment. The development of detailed standards, technical specifications, and operating rules should be the responsibility of the railway companies.

The existing process for developing regulations is slow and could be improved by limiting the involvement of PCO legal advisors to considerations involving intra vires (see also Air Safety Regulation). Changing the responsibility for regulation of rail safety from the RTC to Transport Canada should be done in such a way that this process improves rather than regresses.

No reduction in the level of resources (person-years and O&M) is recommended for this program but the movement to performance based operational and technical standards should enable the separation of the rail safety regulation and rail accident investigation functions without requiring additional resources.

The study team also believes that the role of the federal government in safety at grade crossings should be clearly defined after responsibility for Rail Safety Regulation is transferred to Transport Canada.

The level of funding for railway crossings is adequate but there is no compelling reason why the federal government should contribute the maximum sum permitted under the RRCA in respect of equipment costs at grade crossings. Also, provision could be made to protect the level of funding from inflationary erosion.

Due to the high costs associated with grade crossing protection equipment manufactured in the United States, attempts should be made to develop a lower cost Canadian source.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Requiring a competent benefit/cost analysis to be prepared by the regulatory authority for each new or amended regulation concerning rail safety, and this assessment should be scrutinized by the Railway Safety Advisory Committee. If the new or amended regulation does not reduce regulation, or if there is no net benefit to society, the regulatory change should not be introduced.

2. Revising the current formula for the sharing of costs at grade crossings so that more is accomplished with the federal involvement. It is suggested that the maximum contribution by the CTC be limited to 50 per cent with the railway share increased to 25 per cent and the road authorities to 25 per cent recognizing that, in many instances, a lower federal contribution would be appropriate. The CTC should see that processing of applications is expedited to ensure that the available federal funds are committed in time for the actual work to be done for the year funds are available.

3. Investigating the feasibility of funding a product development initiative by Canadian industry to develop lower cost equipment for grade crossing protection.

4. Comment on proposed regulation by the Department of Justice Advisors in the Privy Council Office should be completed normally within 30 working days and exceptionally within 45 working days and their comments limited to questions related to the intent of the Act, e.g. whether the regulation is intra vires.

5. Introducing legislation to transfer the rail safety regulatory function and personnel from the Canadian Transport Commission to Transport Canada. Ultimately, the rail accident investigation function and personnel could be transferred to the proposed Canadian Transportation Safety Board.

6. After the responsibility is transferred, explicit work plans should be established with realistic delivery dates to develop regulations based on performance specifications. Upon implementation of the new regulations, the existing regulations involving technical standards should be revoked.

7. Performance specifications, acceptable to provincial governments, should be developed to ensure that they satisfy highway safety concerns at grade crossings.

SURFACE SAFETY REGULATION - MOTOR VEHICLE

DESCRIPTION

Motor Vehicle Test Centre (MVTS): Testing for enforcement of federal motor vehicle safety and fuel economy standards.

Vehicle Safety and Energy Operations (VSEO): Developing tire safety standards and child restraints, and enforcing motor vehicle safety and emission standards for motor vehicles manufactured in Canada or commercially or privately imported. Investigating defects (motor vehicles, components, tires) and maintaining lists of motor vehicle recalls involving safety-related defects or non-compliance with Canadian motor vehicle safety and tire standards.

Traffic Safety Standards and Research (TSSR): Development and promulgation of safety standards, regulations and test methods for new motor vehicles and components. Development and maintenance of vehicle use, accident, vehicle emission and fuel consumption data bases and related national statistics in support of policy and program development and assessment. Research on factors (vehicular, road and human) affecting motor vehicle safety, emission and fuel consumption in support of standards development, assessment of alternatives to regulation, and evaluation.

Planning and Regional Operations (P&RO): Assessment of the effectiveness of motor vehicle and component safety standards through investigation of accidents, and systematic national sampling of motor vehicle accidents. Development and implementation of a program of safety information to the public.

AUTHORITY

Motor Vehicle Safety Act; Motor Vehicle Tire Safety Act.

OBJECTIVES

To contribute to: The reduction of deaths, injuries and property damage resulting from motor vehicle use through improved safety of motor vehicles; to a reduction in health impairment by reducing exhaust emission levels of new motor vehicles; and energy conservation by reducing the average fuel consumption of new motor vehicles.

BENEFICIARIES

Manufacturers - early identification of problems, reducing recall costs and liability exposure.

General Public - improved road passenger safety and availability of vehicle safety and cost-related information.

EXPENDITURES (84/85)

($000)	MVTS	VSEO	TSSR	P&RO	TOTAL
CAP	278	1,259	21	50	1,608
O&M	2,651	3,416	2,473	2,856	11,396
Transfers	-	-	197	-	197
Total	2,929	4,675	2,691	2,906	13,201
Revenue	300	-	-	-	300
Net Cost	2,629	4,675	2,691	2,906	12,901
Person-years	29	52	31	23	135

Note: The main estimates approved for 1985/86 closely parallel the approved budget for fiscal 1984/85. In the directorate, there are five staff on loan from the Department of Energy, Mines and Resources (EMR).

OBSERVATIONS

The Motor Vehicle Test Centre is the only facility of its kind in Canada and, in essence, has only one major client: The Road Safety and Motor Vehicle Regulations Group. Consequently, the centre's level of activity is dictated by the annual program of the Road Safety and Motor Vehicle Regulations Group.

The Motor Vehicle Test Centre currently generates some revenue from private industry for use of the facilities. Greater private industry use of the facility is limited by existing industry capability, and by the availability of Transport Canada staff to support industrial testing.

Vehicle certification is largely self-certification by manufacturers, with federal inspections carried out on a spot-check basis at the point of manufacture.

Mechanisms for industry input to standards development work well. Industry believes that the responsibility for motor vehicle standards should continue to reside with the federal government, as provincial promulgation or enforcement would produce differing standards across the country, thereby increasing the manufacturers' cost of compliance.

The difference between Canadian and U.S. manufacturing standards is not a significant problem. Some Canadian standards are more strict in recognition of the climatic differences between the two countries. Indeed, foreign manufacturers build vehicles to meet Canadian standards, thus ensuring that U.S. standards will be met.

Accident statistics are aggregated and published by Transport Canada from provincial sources. Because of the lack of uniformity in data collection, the information is not accurate and thus has limited use.

Questions have been raised about the accuracy and currency of the data contained in Transport Canada's fuel consumption publication.

Private importation of motor vehicles is a minor issue with less than 200 units being imported annually.

KEY ISSUES

Should operation of the Motor Vehicle Test Centre be privatized or be on a cost recoverable basis?

To what extent is the current level of, and approach to, standard setting appropriate?

ASSESSMENT

Initially, the Motor Vehicle Test Centre was established to preclude the necessity of having motor vehicle testing being undertaken in the U.S. It was generally accepted at the time that the test centre would not be financially self-sufficient.

The key difficulty in privatizing the test centre is finding a buyer. The major motor vehicle manufacturers have test facilities to meet their own requirements, and smaller manufacturers would not have a sufficient requirement to justify acquisition. A prospective buyer would likely demand a guaranteed level of compliance testing on a captive basis, thereby reducing federal ability to control program costs.

The Motor Vehicle Manufacturers' Association, which represents both major and smaller manufacturers, has indicated no interest in financially supporting the Motor Vehicle Test Centre.

The main impediments to greater cost recovery for test centre use seems to be lack of industry awareness, and lack of adequate on-site personnel to support industry testing requirements. These detriments could be overcome by improved publicity and use of cost-recoverable contract personnel to support industry requirements.

In light of the $2-$4 billion cost that would be imposed by implementation of the announced motor vehicle emission standards relative to the reductions in acid rain achievable through compliance with these standards, the study team proposes that this issue be reconsidered.

Accident statistics published by Transport Canada are, in the view of the study team, unreliable and call into question their use for determination of research priorities and consequential safety standards development.

Much of the research is directed towards high profile issues, e.g. child restraints and school buses. Despite public perception, both areas have achieved good safety records.

In the view of the study team, the mandate and resources of the federal government with respect to motor vehicle safety research require examination. Much of the research could be carried out more cost-effectively and appropriately outside government. Moreover, it is questionable whether use of motor vehicle safety funds for research in the area of human factors is legitimate.

Government research into motor vehicle safety appears to have inhibited the build-up of appropriate capability in this field by universities and non-profit research foundations. The study team believes government involvement would be more appropriate and more effective over the long term if it were to fund the research of other agencies, rather than carrying it out in-house. This should, as a matter of priority, include development of a consistent national data base, as this is the foundation upon which research priorities, and thus standards development, are built.

The publication of a motor vehicle fuel consumption guide should be the responsibility of EMR.

As noted by the Study Team on Regulatory Programs, the private sector has raised concern over announced vehicle emission standards, and whether federal involvement in standards development in general, including compliance testing, encroaches on provincial responsibilities and industry capabilities. That study team concluded that the emission standards should not be enacted without further review, and that the Motor Vehicle Test Centre should be privatized. The Real Property Study Team concluded that privatizing the test centre would not be cost-effective, but that its greater use by industry on a full cost recovery basis should be pursued.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Reviewing the introduction of new motor vehicle emission standards and a report be prepared for Cabinet consideration to, among other things, indicate the cost that would be incurred and the reduction in acid rain levels that would be achieved through this mechanism in comparison with other means of reducing acid rain levels.

2. Reducing the cost to government of the motor vehicle safety regulation program by 25 per cent on a phased basis over three years through a program of more selective approach to the development of standards.

3. Changing transport Canada's involvement in motor vehicle safety research to providing a framework for independent research, assisted initially by federal grants. The amount of money for this activity could be set initially at the 1984/85 in-house research levels, and phased out on a gradual basis as universities and institutions develop the requisite capabilities and alternative funding sources.

4. With respect to the Motor Vehicle Test Centre, aggressively pursue options for greater use by the private sector to enhance cost recovery.

5. Endeavouring to develop common accident reporting standards so that data will be meaningful.

6. The "Fuel Consumption Guide" not be published by Transport Canada.

7. Requiring that a competent benefit/cost analysis be prepared for any new or amended regulation, and except where the proposed regulatory change is to reduce regulation, any regulation for which there is no net benefit to society should not be introduced.

TRANSPORTATION OF DANGEROUS GOODS

DESCRIPTION

Transportation of Dangerous Goods/Regulation
Transportation of Dangerous Goods/Inspection
Canutec (Canadian Transport Emergency Centre)
Transportation of Dangerous Goods - Training

The development and evaluation of regulations and standards for the transportation of dangerous goods, education and examination of inspectors, inspections, and the provision of support programs for response to dangerous goods accidents.

Annex C contains individual program descriptions.

AUTHORITY

Transportation of Dangerous Goods Act (TDG Act); International Conventions and Codes; Bilateral Agreements.

OBJECTIVES

The safe transportation of dangerous goods in Canada.

BENEFICIARIES

The transportation industry and the general public.

EXPENDITURES (85/86)	**($000)**
CAP	210
O&M	10,460
Transfer	-
Total	10,670
Revenue	-
Net Cost	10,670
Person-years	92

Notes: The expenditures describe only the resources allocated to the Transportation of Dangerous Goods (TDG) Directorate. The TDG Directorate is in the process of being transferred to the Surface Administration of Transport Canada.

An additional 32 person-years (person-years) for the TDG Directorate have been approved by Treasury Board: 26 in 1986/87 and six in 1987/88.

There are 13 person-years in TC's Air Administration and eight person-years in TC's Marine Administration dedicated to the transportation of dangerous goods.

There are 34 person-years in the Canadian Transport Commission's (CTC's) Railway Safety program allocated to the transportation of dangerous goods. It is planned that this program will be transferred to Transport Canada.

It is forecast, therefore, that by 1987/88 the total person-years complement of departmental personnel concerned with the transportation of dangerous goods will be 179, with consolidated program costs of approximately $15 million.

OBSERVATIONS

Regulations covering the transportation of dangerous goods have always existed. The degree of compliance or intensity of enforcement in the past is unknown but there was no evidence that it was inadequate, or that the public was concerned about the situation prior to the Mississauga incident.

The development of the TDG Act and the subordinate regulations, which was aimed at replacing the modal regulations with a standardized set of regulations (pertaining to all commodities/all modes), has been a time-consuming endeavour but it is now complete. The regulations came into force on July 1, 1985.

The high degree of compatibility between United States and Canadian regulations permits the regular flow of trade involving dangerous goods between the two countries with only very minor constraints, although a formal bilateral agreement has not been reached.

The regulations were initially vigorously opposed by industry and carriers because of the degree of detail which made interpretation difficult, and because of the costs associated with compliance. For example, the program to date has cost each small trucker on average approximately $100,000 and each large trucker on average approximately $500,000. In the view of truckers, the benefits from this program are nebulous but the costs are real.

Opposition to conforming with the regulations has largely abated, partly due to recent refinements pertaining principally to consumer commodities, and partly because the up-front costs (training, placarding) have been spent and the program is now a reality. Another factor that has served to placate the industry is the indication by Transport Canada that it is prepared to consider further simplification of the regulations based on experience.

Training of inspectors is a particularly important component of ensuring compliance. Without on-site inspections, it is anticipated that some parties would not comply.

Transport Canada has contracted with provincial agencies (e.g. fire departments, occupational health and safety units, etc.) to undertake inspections on the federal government's behalf.

The directorate has developed a training package but is delivering it only upon request. A few provinces (e.g. Ontario, Alberta) have their own on-highway training programs and major carriers conduct training programs for their own personnel. The Canadian Truckers Association and the Canadian Industrial Transportation League also provide training.

All interested parties agree that Canutec (Canadian Transport Emergency Centre) is performing a very valuable role. Emergency response training is undertaken jointly with Emergency Planning Canada.

Development and delivery of public awareness programs and emergency response programs fulfill a recognized need.

Regulations with regards to specifications for packaging material are scheduled to be enforced commencing in 1987/88.

KEY ISSUES

Should the Transportation of Dangerous Goods Directorate be the focal point for all federal government TDG inspectors?

Is there potential for cost recovery?

Is the approved increase in program resources required?

ASSESSMENT

In the view of the study team, the TDG Directorate should be the focal point for the department's activities pursuant to the transportation of dangerous goods. Under the departmental reorganization, the CTC Rail Safety program is scheduled to be transferred to the Surface Administration, which will allow the consolidation of the 34 person-years allocated to the transportation of dangerous goods in that program with the TDG directorate. For reasons of efficiency, it is proposed that the Air Administration's TDG group (13 person-years) and the Marine Administration's TDG group (eight person-years) be transferred to the TDG directorate. The directorate, however, should then be located in the Corporate Policy group.

Treasury Board's recently approved expansion of both the CTC and TC dangerous goods programs should, the study team believes, be re-examined with the view of maintaining staff at the present level. The consolidation of the program (surface, air, marine) should provide an opportunity to develop multi-modal inspectors which should mean fewer inspectors particularly in regional offices. The finalization of training packages and public awareness programs coupled with the move toward performance specifications in lieu of developing detailed technical specifications could further decrease the need for additional resources.

It would appear that the only prospect for cost recovery would be to charge for training seminars. Because major enterprises are training their own personnel, and with the advent of commercial training institutes and agencies, cost recovery possibilities are not encouraging the study team believes.

Recognizing the industry's pragmatic acceptance of the need to comply with the regulations, the Transportation of Dangerous Goods Advisory Committee could undertake an evaluation of the entire program with a view to simplifying the regulations by converting to performance specifications where appropriate. For example, it is the opinion of the study team that the TDG directorate should develop, in cooperation with the Canadian Standards Association, performance specifications for packaging material rather than attempting to develop detailed technical packaging than attempting to develop detailed technical packaging specifications. It also suggested that the adoption of International Air Transport Association standards for the shipment of goods by air would be an acceptable alternative to the Canadian code.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Continuing Canutec (Canadian Transport Emergency Centre) in its present form.

2. Continuing contracting out motor carrier inspection activities to the provinces/territories.

3. Intensifying efforts to conclude a reciprocal agreement with the U.S. Department of Transportation covering the transborder movement of dangerous goods.

4. Consolidating all dangerous goods inspectors in the TDG directorate, and the directorate to the Corporate Policy, Planning and Coordination Group.

5. Accelerating simplification of the Transportation of Dangerous Goods Regulations by converting to performance specifications so as to reduce the difficulties for industry in achieving compliance while ensuring an adequate level of protection for the general public. The merits of adopting International Air Transport Association standards for air goods should be considered as an acceptable alternative to the Canadian code.

6. Capping the level of resources assigned to this program at the 1985/86 allocation and additional resources provided only if required for the accelerated conversion of regulations to performance specifications.

7. Performing a competent benefit/cost analysis for any new or amended regulation, and except where the proposed regulatory change is to reduce regulation, any regulation for which there is no net benefit to society.

8. Conducting an A-base review of the level of resources for dangerous goods activities so as to match the ongoing program needs with the post-implementation activities.

TRANSPORTATION OF DANGEROUS GOODS

PROGRAM DESCRIPTIONS AND ASSOCIATED RESOURCES (84/85)

Transportation of Dangerous Goods/Reg.: Regulations and awareness programs with respect to the handling, offer for transport, and transportation of dangerous goods throughout Canada and by all modes of transport.

PYs = 28   CAP = $50,000   O&M = $2,625,000

Transportation of Dangerous Goods/Insp.: Inspection activities for the transportation of dangerous goods are carried out by: the Coordination Group, Transportation of Dangerous Goods (TDG) Directorate, for shippers of dangerous goods and manufacturers of containers and packagings; by the Canadian Coast Guard, Ship Safety Branch, for marine transportation; by the Canadian Air Transportation Administration, Licensing and Operations Division, for air transportation; by the Canadian Transport Commission, for rail transportation; and by the provincial governments, for highway transportation.

PYs = 22   O&M = $1,596,000

Canutec: This 24-hour-a-day centre for emergencies involving dangerous goods provides information, co-ordination services, and communication linkages for the handling of dangerous goods accidents. The centre is also a source of information on dangerous goods and regulations and support programs.

PYs = 8   O&M = $613,000

Transportation of Dangerous Goods - Training: Training and awareness programs for safety personnel such as firefighters, police officers, and municipal emergency response coordinators are offered in areas such as identification of dangerous goods vehicles, response measures, and resources and contingency plan development, through Emergency Planning Canada's Emergency Response Program by the Coordination Group.

PYs = 2   O&M = $146,000

ACCIDENT INVESTIGATION

OVERVIEW

Federal accident investigation activities are now the responsibility of three separate organizations: the Canadian Aviation Safety Board (CASB); the Marine Casualty Investigation Branch of Transport Canada's Marine Administration; and the Railway Transport Committee of the Canadian Transport Commission. In addition, the department's Inspector General Transportation Safety is responsible for reviewing major safety issues and commenting on accident reports.

Accident investigation in transportation has always been and will continue to be an activity of major public concern. The travelling public wishes to be assured that such activity is, to the fullest extent possible, carried out in a thorough, impartial and effective manner. With this in mind, the study team identified two key issues: the degree of independence required for accident investigators, and the merits of a multi-modal approach.

At the present time, the independence of accident investigators, which can be defined as the degree to which investigators are separate from the regulators and those involved in operations, varies greatly depending on the mode, but in no case is there complete independence. The Marine Casualty Investigation program and the Railway Safety program are integral parts of the organizations which are simultaneously responsible for safety regulation in these modes. The CASB, despite enjoying the most independence, faces two significant constraints vis-à-vis the regulator: its resource allocation is subject to the Minister of Transport and it reports to Parliament through that minister.

The role of the Inspector General Transportation Safety is not defined and seems to depend largely upon what the minister and deputy minister want him and his organization to do.

As to the issue of multi-modalism, Bill C-40, introduced but not passed in 1979, proposed an independent, multi-mode accident investigation board. Subsequently, at least one judicial inquiry in Canada has recommended that this option should be carefully considered.

In comparison, Transport Canada's proposed reorganization appears to call for an accident investigation unit which would be multi-modal in scope but which would be housed within the department. Thus, it would bring multi-modalism but at the expense of independence.

The situation in the U.S. presents a sharp contrast on both issues. The U.S. National Transportation Safety Board (NTSB) is predicated on complete independence from the safety regulators and is responsible for all modes. It also is remarkably resource-efficient, due partly to the secondment of regulatory and technical experts and other specialists to the multi-disciplinary teams formed by the NTSB for on-site investigation, partly due to the delegation of the investigation of certain types of accidents, and partly due to more efficient operating procedures.

The study team is convinced that operational independence and a multi-modal approach are critical to meeting the public need for thorough, impartial and effective accident and incident investigation in a resource-efficient manner. Therefore, the study team proposes that the federal government should establish a Canadian Transportation Safety Board which would have the responsibility of improving safety by investigating accidents involving a fatality or a substantial loss of property in all federally-regulated public modes of transportation, and which would report directly to Parliament. As an interim step, a National Transportation Safety Advisory Board could be established with representatives from the public and private sectors to advise the Minister of Transport on safety issues, trends and special topics related to safety in transportation.

The study team also proposes that the office of the Inspector General Transportation Safety be disbanded.

ACCIDENT INVESTIGATION
AND
INSPECTOR GENERAL TRANSPORTATION SAFETY

DESCRIPTION

Canadian Aviation Safety Board (CASB): The board empowered to investigate aviation accidents, to determine the contributing factors and causes, and to make recommendations to improve aviation safety.

Marine Casualty Investigation (MCI): Marine Casualty Investigations of the Marine Administration of Transport Canada is responsible for investigating marine casualties and accidents aboard ship.

Railway Safety (RS): The Railway Transport Committee of the Canadian Transport Commission investigates railway accidents, determines the contributing factors and causes, and regulates to improve railway safety.

Inspector General Transportation Safety (IGTS): Responsible for reviewing and commenting on major policy proposals and accident reports relating to transportation safety, and for examining transportation safety issues of public concern where the Minister or Deputy Minister believe that an independent review is warranted.

AUTHORITY

The Canadian Aviation Safety Board has been established pursuant to the enabling legislation, the Canadian Aviation Safety Board Act.

Marine Casualty Investigations are enabled by the Canada Shipping Act.

Investigations of railway accidents are conducted pursuant to Section 19 of National Transportation Act and Section 226 of the Railway Act.

Formation of an office of the Inspector General Transportation Safety was authorized by the Minister of Transport.

OBJECTIVES

The primary objective is to promote safety in transportation through the investigation of accidents and incidents, and to preclude recurrence through the development of appropriate recommendations. Acquisition and retention of accident statistics enables the identification of trends and the formulation of comparisons so as to indicate areas of concern for safety in transportation.

BENEFICIARIES

Benefits include safe and secure modes of transportation for the transport of people and goods in Canada. Beneficiaries include the air, marine and rail transportation industries, users of federally regulated public modes of transportation, and the general public.

EXPENDITURES[1]

($000)	IGTS	CASB	MCI	RS [2]	TOTAL
CAP	-	1,190	180	-	1,370
O&M	458	12,431	1,728	1,220	15,837
Transfer	-	-	-	-	-
Total	458	13,621	1,908	1,220	17,207
Revenue	-	-	-	-	-
Net Cost	458	13,621	1,908	1,220	17,207
Person-years	5	182	41	24	252

[1] CASB and Railway Safety - 1985/86; others 1984/85.

[2] Estimated amount of Railway Safety related to accident investigation.

Notes: The foregoing does not include funding for ministerially ordered inquiries pursuant to Section 19 of the National Transportation Act. To give some appreciation of the costs that are incurred as a result of those inquiries, the Mississauga/Grange Inquiry was concluded at a TEC of $1.1 million and the Air Canada "Gimli Incident" at a TEC of $1.4 million.

The office of the Inspector General Transportation Safety has no formal allocation of resources and is staffed (except for the Inspector General) on a term basis.

OBSERVATIONS

Currently, the authority for investigating accidents is vested in three separate organizations: the Canadian Aviation Safety Board (CASB) for air; the Marine Administration of the Department of Transport for marine; and the Railway Transport Committee of the Canadian Transport Commission for rail.

Bill C-40 in 1979 envisioned an independent board which would have had jurisdiction to investigate accidents for safety purposes over all federally regulated modes of transport. The bill died on the order papers.

The CASB was established in large measure as a result of the recommendations of the Dubin Commission of Inquiry. Fundamentally, the objective was to separate the accident investigators from the regulators. Although Mr. Justice Dubin considered that it would be preferable if the Air Board reported to Parliament through a minister other than the Minister of Transport and made a recommendation accordingly, he also stated that "I am not as concerned as others appear to be that if the board were to report to Parliament through the Minister of Transport, it would diminish its independence".

Mr. Bernard M. Deschênes, Q.C., was appointed by the Minister of Justice to carry out on behalf of the Minister of Transport an independent study on the effectiveness and impartiality of marine casualty investigation in Canada. With respect to reporting to Parliament, Mr. Deschênes concluded that it should be through the Minister of Transport, mainly for "practical reasons". He went on to state: "Being directly responsible to Parliament and to the public for the improvement of the safety of navigation, the Minister of Transport should have a keen interest in seeing that the independent investigating authority has appropriate means to discharge its duties. Should difficulties arise in the relationship, the investigating authority could easily report such difficulties to Parliament, to which it should report annually."

There has been no independent inquiry of the merits of divorcing railway accident investigation from railway safety regulation. Mr. Deschênes recommended in his report: "A study should be undertaken immediately and a determination should be made as soon as possible with respect to the inclusion of the investigation of accidents in the surface mode of transport in a multi-modal safety board."

Transport Canada's proposed reorganization appears to be based on consolidation of all accident investigation for all modes in one organizational unit within the department.

The only multi-modal accident investigation board known to be in existence is the U.S. National Transportation Safety Board (NTSB). Interviews with officials of the NTSB, the U.S. Department of Transportation, the Federal Aviation Administration and the Air Transport Association of America identified four major points:

1. The complete independence of the NTSB is an absolutely paramount consideration.

2. The method of operation of the NTSB allows the board to conduct a significantly greater number of investigations than would be possible under the Canadian system with the same resources. For example, the multi-modal NTSB has a staff of 343 compared to the CASB's stated requirement of 216. The difference is largely explained by the assignment of regulatory and other personnel to NTSB on-site accident investigation teams, and by delegating the investigation of certain types of accidents.

3. The NTSB organizational structure takes advantage of economies of scale in disciplines that are not modal specific, e.g. medicine, metallurgy, statistics, etc. but ensures that the actual investigation of the accident is conducted by a modal expert.

4. The NTSB procedures foster timeliness in the production of accident investigation reports.

The role of the Inspector General Transportation Safety is nebulous and would appear to be largely dependent upon what the minister and deputy minister want it to be.

KEY ISSUES

Would a single totally independent board having the responsibility to conduct accident investigations and inquiries in all modes of federally regulated transportation (so as to determine cause, make recommendations but not attach blame) be more effective?

If there were to be an independent Canadian Transportation Safety Board (CTSB), should the board report directly to Parliament, or through the Minister of Transport, or through another minister?

If there were to be an independent CTSB, should the enabling legislation be drafted so as to focus less on procedures and more on performance of the board?

If there were not to be an independent CTSB, should there be a multi-modal National Transportation Safety Advisory Board, with modal sub-boards?

What should be the role, if any, of the Inspector General Transportation Safety?

ASSESSMENT

In the view of the study team, the fundamental determinant in the selection of a course of action is the degree to which independence in accident investigation is seen to be necessary and at what cost.

Based on the NTSB model, independence in operations, analysis, and in formulating recommendations is critical while a team approach to on-site fact finding can be used to contain the cost of the proposed board.

The CASB model stresses total independence in all aspects of accident investigation with attendant higher costs to the board (but not necessarily to the federal government) but is subject to the Minister of Transport for resource allocation (this could be more of a problem in the future as it is understood that efforts are being made to include the CASB in the Transportation Expenditure Envelope).

Statements by the Minister of Transport as well as the proposed reorganization suggest that the intent is to have the responsibility for accident investigation consolidated within the department. These actions again raise the issue of the degree of independence from the Department of Transport and the Canadian Transport Commission that could be legislated.

It is the view of the study team that a multi-modal accident investigation board reporting directly to Parliament is the preferred model. This board would have the mandate to investigate the cause of accidents and incidents and to make recommendations to the Minister of Transport. The minister should have 90 days to respond to these recommendations and where appropriate, part of the response should be a benefit/cost assessment. The board would have the authority to delegate the investigation of accidents to the Air, Marine and Surface Administrations of the Department of Transport as well as the air, marine and rail carriers with the retention of an audit or oversight capability. The board should have the responsibility to ensure that meaningful accident statistics are collected and disseminated. The legislation creating the multi-modal board should remove the authority for the Minister of Transport to initiate ministerial accident investigation inquiries.

If there is not to be a multi-modal accident investigation board, or until such time as the board is created, there could be a National Transportation Safety Advisory Board with modal sub-boards involving government, industry, labour and consumer participation to advise the minister on safety trends, on high profile incidents and accidents, and to consider matters referred to the Board by the minister.

In the view of the study team, the Office of the Inspector General Transportation Safety is not necessary. Responsibility and accountability could be vested in the appropriate program managers and the deputy minister of Transport could ensure that the managers execute their mandates efficiently and effectively.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Eliminating the office of the Inspector General Transportation Safety and use some of the resources saved used to enhance the collection of accident statistics.

2. Creation of a National Transportation Safety Advisory Board with modal sub-boards with government, industry, labour and consumer representation to advise the minister on its own volition or on request of the minister concerning transportation safety.

3. Introduction of legislation as soon as practical to create a multi-modal Canadian Transportation Safety Board (CTSB) reporting directly to Parliament with jurisdiction to investigate all accidents in air, marine or rail transportation involving a fatality or substantial loss of property, and any other accident in these modes the board deems appropriate bearing in mind its primary function is to improve safety in transportation; to determine the cause of the accident or incident; and to make appropriate recommendations to improve transportation safety. Such legislation could limit the number of members that could be appointed to the board; require that members demonstrate appropriate professional or technical competence in the field of transportation or related fields; enable the board to make recommendations to the Minister of Transport with the minister having 90 days to respond to the recommendations; authorize delegation of accident investigation to Transport Canada or other parties; and specify the operating procedures of the board so as to facilitate the timely production of comprehensive accident and incident reports. The CTSB should attend to the collection and dissemination of the necessary accident and incident statistics and initiate or participate in educative or preventative programs to improve transportation safety.

4. Allocating the resources for the Canadian Transportation Safety Board from the resources now allocated to the Canadian Aviation Safety Board, Marine Casualty Investigation and the railway accident investigation component of the railway safety regulation program.

AIR TRANSPORTATION OPERATIONS

OVERVIEW

Over a relatively short period of time, air has become the dominant mode of inter-city public passenger transportation in Canada. Given its dramatic growth and, perhaps more importantly, its transition from being the preserve of business and well-to-do leisure travellers to a truly public mode of transportation, it is not surprising there are a number of problems that need to be resolved.

Before addressing these problems, it is necessary to acknowledge the extensive and substantial involvement of the federal government in air transportation. This can be illustrated by describing the federal role in terms of each of the three transportation planning elements: the way, the terminal; and the vehicle.

Throughout the development of civil aviation, Transport Canada has had virtually exclusive responsibility for the air way system based jurisdictionally on the BNA Act and practically on the fact that the system did not and could not recognize provincial boundaries. Thus the department manages the airspace, installs and maintains almost all air navigational and surveillance aids, provides air traffic control or air advisory services, attends to the provision of aviation weather service, is responsible for height zoning and air field geometry, etc.

The evolution of the federal government's role in the air terminal system has been rather more pragmatic in terms of ownership and operation although it has always had responsibility for licensing aerodromes as a function of safety regulation. At the end of World War II, many of the major airports were owned by municipalities. As the demand for air transportation grew, the municipalities were faced with the requirement to provide for substantial capital investments. Ultimately, they chose to turn the facilities over to the federal government, in some cases with a substantial payment being made by the government for the assets acquired. At the present time, the federal government owns all of the international and national airports, and most of the larger regional as well as some local commercial airports. In addition, the government subsidizes a number of non-federal airports.

The federal involvement in the vehicle is in two forms. First, the government has regulated, both from a safety and an economic viewpoint, the operation of the vehicle. Second, the government owns Air Canada as a crown corporation and there is no question but that this has influenced the air transportation infrastructure and air economic policy. Indeed, the ownership of Air Canada is a major issue in the context of full economic deregulation.

With respect to cost recovery, the study team has noted the commendable progress that was being made through the 1970s. Indeed, a rough calculation indicates that the 23 airports in the Airports Revolving Fund achieved full cost recovery in 1980/81 and the shortfall in "Other" airports had been reduced to about $17.00 per originating passenger. In contrast, the situation in 1984/85 had deteriorated to the extent that there was a shortfall of about $3.00 per originating passenger using the airports in the Revolving Fund, and $56.00 per originating passenger using the "Other" airports. Although a large part of this turnaround can be attributed to the drop in passenger activity over this period and to the curtailment of revenues caused by the "6-and-5" program, still the study team cannot but remark on the seeming lack of attention to this important issue. It should also be mentioned that the ANS shortfall per orginating passenger rose from $7.00 to $14.00 over the same period, and per itinerant aircraft movement, from $66.00 to $144.00. It is acknowledged that these figures are only rough approximations but they do serve to highlight the need for action to reverse the trend.

Against this background of the federal government's involvement in air transportation, the study team has assessed the cost effectiveness of program delivery, principally by Transport Canada and by the Canadian Transport Commission through its Air Transport Committee. Some of the following issues are dealt with in separate Overviews because it is believed that their generic similarities provide useful linkages to issues raised in other modes (e.g. economic regulation). Nonetheless, they are described here, at the risk of some redundancy, to ensure that the Task Force has an overall perspective of the federal involvement in air transportation.

AIR ECONOMIC REGULATION

The study team has concluded that a further reduction in the regulatory burden, consistent with the May 1984 domestic air policy statement, would benefit the travelling public and the air carrier industry, and would marginally reduce the federal resources required for this program.

AIR SAFETY REGULATION

It seems apparent that the commitment by the federal government to assure aviation safety, particularly in light of the initiatives to reduce economic regulation, will require additional resources. The availability of these resources within the department's proposed budget, i.e. after the significant reductions mentioned in the May 1985 budget paper, has not been obvious. Moreover, the department is going through an internal downsizing exercise that has the potential for exacerbating the shortage in resources that currently exists. The study team is especially concerned about the need for staff in civil aviation medicine, personnel licensing, aircraft and facility certification, etc. In addition to these resource deficiencies, there are serious legal problems being encountered in finalizing and promulgating regulations for air safety purposes and the study team believes that these must be brought to the attention of Ministers.

AIR ACCIDENT INVESTIGATION

The creation of the Canadian Aviation Safety Board has raised some problems of an operational nature that manifest themselves in resource requirements and these must be addressed quickly to preserve the concept of an independent agency as was envisaged by Parliament when the enabling legislation was passed. The study team is also of the opinion that, with a change in reporting relationship and some changes in operating procedures, the board makes a good model for a multi-modal accident investigation agency.

AIR TRANSPORTATION TAX

The study team has addressed three aspects of this program. First, the basic inequity in a percentage tax with no ceiling. Second, the adoption of this tax as the major funding source for civil aviation capital expenditures as a mechanism for injecting some discipline into the capital needs for that program activity. Third, the development of a cost allocation methodology to spread the burden equitably among all users, and to facilitate conversion of the tax to a user fee.

CIVIL AVIATION

Arguably one of the most serious problems for the federal government in air transportation is the burgeoning cost of infrastructure related to the air way system. Because the facilities and services have or can appear to have safety connotations, the debate about their justification quickly becomes emotional, notwithstanding the fact that in many instances the basic justification for new or improved equipment is to increase capacity or regularity of operations. The study team has addressed in detail actions it believes are necessary to regain control of expenditures in this area.

AIRPORTS

There are two fundamental issues in the delivery of the airports program. The first concerns the possibility of delegating or transferring management and operation of airports to a local authority, and the second is the efficiency of the operations under federal management. The study team is of the view that these must be addressed concurrently.

In proceeding with local management of airports, the issue of non-federal ownership is almost certain to arise. The government should be prudent in its disposal of federal airport assets, not only because of their commercial value, but also because of the precedent that could be created. Accordingly, it is important that account be taken of the present and future value of the assets when the terms of transfer are being negotiated.

OTHER

In addition to the foregoing major items, there are a few small aviation programs that have been assigned to Air Transportation Operations where that was considered to be appropriate (Air Transportation Infrastructure in Northern Quebec), or to Water Transport Assistance (Coastal Labrador Airstrips), or to Other (Aviation Statistics, Transportation Training, Transportation of Disabled Persons).

The themes the study team believes are appropriate for the programs in Air Transportation Operations can be summarized as capital and operations cost-containment; user agreement in the selection of programs and projects for funding; allocation of costs to the users of the system with cost recovery targets established as a function of that allocation, greater emphasis on cost-recovery from the users of the system; and more effort devoted to exploiting opportunities for local involvement in the management of airports.

It is the study team's overall conclusion that the level of service and the unit cost of providing that service in both the air way and the airports systems are excessive, and that a significant reduction should be achievable without adversely affecting safety, and with minimum impact on the air travelling public and the air carrier industry. It is the team's view that the airports and civil aviation operations programs related to commercial activities should reach overall self-sufficiency within five years, so that there will be no burden on the general taxpayer except in support of the military (and that should be through National Defence), or where there is an imposed public duty, or where the federal government decides not to recover the costs from the user. It is the team's view that, unless vigorous efforts are made, private general aviation will fall into the last category by default.

Finally, the study team would again emphasize the advantages of private sector representation on the departmental program control board to assist departmental senior management in deciding upon expenditures for the civil aviation and airports programs.

AIR TRANSPORTATION TAX

DESCRIPTION

This tax is one of several sources of revenue used to help pay for Canadian civil aviation terminal and way facilities and services.

AUTHORITY

Part II of the Excise Tax Act.

OBJECTIVES

To obtain, through a tax on the ticket, revenues from the passengers who use the Canadian air terminal facilities to defray a portion of the costs of the air transportation system.

BENEFICIARIES

The government benefits directly from this source of revenue because it offsets the costs of providing facilities and services in support of the civil air transportation system. Indirectly, industry benefits because the facilities are provided to support the civil air transportation system while a portion of the costs is recovered directly from the passenger by the federal government.

EXPENDITURES (85/86)	**($000)**
CAP	-
O&M	50
Transfer	-
Total	50
Revenue	295,500
Net Cost	(295,450)
Person-years	1

Notes: At the present time, the revenue from the air transportation tax is split with 14.4 per cent allocated to civil aviation operations (the air way system) and 85.6 per cent to airport operations (the air terminal system).

All CTC Class 1 services, and any other passenger-carrying aircraft of 18,000 pounds and above, are subject to the tax.

As of September 1, 1985, the ticket tax is being levied as follows:

Domestic: 9 per cent of ticket - no ceiling.

Transborder (continental U.S. and Alaska):

- tickets purchased in Canada, 9 per cent;
- tickets purchased in the U.S., where U.S. departure tax of 8 per cent applies and within 225 mile remission zone, 4 per cent to a maximum of $15.00; and
- tickets purchased in the U.S., where no U.S. departure tax is applicable or to any destination outside of the remission zone, 9 per cent - no ceiling.

International (including Hawaii and Puerto Rico): $15.00.

An annual increase in tax revenue of about $80 million is attributable to the increase in percentage from 8 per cent to 9 per cent (April 1/85) and removal of the ceiling (September 1/85). These additional revenues will not be fully realized until 1986/87.

OBSERVATIONS

The air transportation tax was originally proposed as a user fee but strong lobbying on the part of the air carrier industry resulted in the government's agreeing to a tax. The air carrier's association (ATAC) continues to believe the charge should take the form of a tax so that it will be clearly displayed on the passenger's ticket.

Increasing the tax has been a convenient means of obtaining more revenue, partly because a relatively small percentage change in the tax results in substantial additional recovery, and partly because increases are generally announced pursuant to the budgetary process which circumvents the normal need for consultation.

There is nothing to prevent an airport operator from charging a user fee in addition to the tax, and in fact this is done at Edmonton Municipal Airport.

At the present time, the airport portion of the tax is "credited" to individual airports on a pro rata basis, according to the number of enplaned passengers.

The elimination of the ceiling on the tax for domestic tickets has placed a greater burden on those that normally have the greatest distances to travel, i.e. those living in provinces such as Newfoundland and British Columbia and the territories. In addition, the latter have less likelihood of discount fares, especially deep discount fares. Paradoxically, the air carriers and the passengers they serve place the least burden on the airport and the airway system, partly because the density of traffic does not require the sophisticated radar and navigational equipment available in the south, and partly because the density of population results in utilization of smaller aircraft thereby not stressing the airport passenger handling facilities.

One of the basic problems encountered in reviewing this tax is that the Air Administration has no cost accounting system nor a cost allocation model.

KEY ISSUES

Is a percentage tax, without a ceiling, equitable for travel within Canada?

Should the tax bear a relationship to the costs of the airport and airway system?

Can the current percentage apportionment of the tax between airports and airway expenditures be rationalized and if not, is it optimum?

Is the allocation of the airports portion of the tax on a pro rata basis to federal airports only according to enplaned passengers a reasonable approach?

ASSESSMENT

In the view of the study team, the first issue is a question of transportation and fiscal policy. It is the study team's view that the latest change in the method of calculating the tax for domestic tickets undoubtedly places a heavier burden on those who live in the extremities of the country. Among other things, this seems to belie the notion of equity that has been one of the basic precepts of the formulation of transportation policy. The Team has concluded that the approach of a percentage tax without a ceiling is inequitable because:

a. It places a greater burden on those who have the furthest to travel and the burden cannot be shown to be directly related to the cost.

b. It places a greater burden on those who have the least possibility of using alternate means of travel, (for long distances, air is the only viable mode of public passenger transportation).

c. The percentage nature of the tax means that passengers using discount fares, for whom it can be shown place the same load on the airway system and a greater load than economy fare passengers on the airport system (because they are generally more likely to have greeters, well-wishers, baggage, etc.), pay less tax than their full fare paying companions.

It was also noted by the study team that elimination of the ceiling does not make use of the opportunity provided by a fixed tax to encourage the use of alternate public modes of transportation, such as rail, for short distance travel.

Although the study team has considered the possibility of replacing the percentage/no ceiling with a fixed base plus percentage according to distance to correct some of the foregoing deficiencies, it was recognized that this substitution would retain some of the drawbacks but more importantly it would be difficult to administer. It is the team's conclusion that the domestic tax should be a fixed amount, adjusted annually for inflation. The study team estimates that the tax would have to be set at $12.50 per originating passenger for 1985/86 to recover about the same revenues from domestic passengers as are estimated from the 9 per cent tax with no ceiling.

All of the other key issues are inter-related in the sense that the fundamental decision to be taken is the basic approach to cost recovery of federal expenditures in support of the airway and airport systems. A decision on the level and method of cost recovery for the airway system would resolve much of the uncertainty.

Currently, there are three major sources of revenue for airports: the airports portion of the air transportation tax; landing and other national fees; and revenues from concessions, land rentals, etc. at individual airports. By contrast, the airways costs are offset only by the north Atlantic and polar telecommunications fees, some miscellaneous other charges, and a charge-back to the self-supporting airports for terminal air navigation and air traffic services at those airports, in addition to the airway portion of the air transportation tax.

Assuming the government's intention should be to move towards full recovery of costs in the mature parts of the civil air transportation system, it seems clear that either the amount of the ticket tax to be devoted to the airway must be increased significantly or a new enroute fee must be introduced. Given the problematic nature of an enroute fee as is outlined in the Civil Aviation Operations program profile, the study team believes it is preferable to avoid that course of action and to use the air transportation tax as the major source of revenue for civil aviation operations.

The adoption of the objective of full cost recovery in the mature parts of this system and of the principle that the major source of revenue for civil aviation operations should be the air transportation tax necessitates early action to determine the costs of the airway system to be borne by the different users of civil aviation facilities and services. Accordingly, the study team has concluded that the Air Administration would have to:

a. Review the airway cost base and divide the costs into four components based on informed judgement until such time as a cost accounting system can be developed and implemented for:

   - commercial air carrier costs;
   - commercial general aviation costs;
   - private general aviation costs; and
   - military aviation costs.

b. Examine the surveillance and navigational aid projects in the procurement phase and allocate those costs to the same four categories.

c. Establish short and long-term cost recovery targets for each category.

d. Use the air transportation tax and any other proposed way revenue to offset the shortfall in the recovery of the costs for commercial air carrier operations; introduce a charge for commercial general aviation operations; develop strategies for revenue generation using fuel taxes, special assessments, etc. for private general aviation; and charge the military for the costs they impose on the civil airway system.

Supplementary to the foregoing proposals are the following principles:

a. A reapportionment of the air transportation tax revenues between the airway system and airports to provide a federal fund for ongoing operations and capital improvements in support of commercial civil air transportation.

b. A reapportionment of the airports portion of the tax so that more is credited to smaller airports and less to larger airports.

c. Provision for non-federal airports to obtain a payment equal to what would be available to a federal airport.

d. Where airport authorities (i.e. non-federal airport operators) access this federal fund, a commitment from the airport operator to see that operational safeguards are maintained, e.g. land use planning commitments to avoid unnecessary restrictions on the use of a public facility.

In the longer term, the study team favors replacement of this tax and any other taxes being contemplated, by a user fee applied to all commercial air carriers as the study team believes that it is only when the user has to incorporate the costs in the tariff charged that the user will become truly concerned about the costs.

OPTIONS

The following proposals were thoroughly discussed by the Committee although unanimity was not achieved on the desirability of conversion of the tax to a user fee. Moreover, the dissenting member points out that the Air Transport Association of Canada, the largest air carrier industry association, is firmly opposed to conversion of the air transportation tax to a fee.

Accordingly, the study team recommends to the Task Force that the government consider the following:

1. Taking immediate steps to replace the percentage/no ceiling air transportation tax with a fixed tax of $12.50/originating domestic and transborder passenger, with provision for upward adjustment to prevent revenue erosion by inflation.

2. Immediately commencing the development of a cost accounting methodology for air transportation capital, operating and maintenance expenditures with a target of six months for completion, i.e. March 31, 1986, so that a reasonably accurate apportionment of costs to the various users of the airway and airports systems can be made.

3. Until such a methodology has been developed, discussed with the industries and the military, and implemented, the costs of the civil airway system should be apportioned among the four primary users based on informed judgement and in consultation with the principle user associations and the department of National Defence.

4. The industry should be advised that the method of funding the airway and the airport system will be changed effective April 1, 1986. The tax would become the principal source of revenue for the airway system, and the allocation among airports would be such that smaller airports will receive a greater contribution per passenger.

5. Non-federal airport authorities should be advised that their airports will be entitled to revenues from the air transportation tax in the same way as federal airports.

6. A plan should be formulated to implement conversion of the tax to a user fee by January 1, 1990.

CIVIL AVIATION OPERATIONS

DESCRIPTION

- Air Transportation Tax (Civil Aviation Operations Portion)
- Aeronautical Flight Safety Aids
- Aircraft Search and Rescue Alert
- Air Traffic Control
- Airports and Area Control Services
- Airspace Management
- Airspace Reservation Service
- Navigation Aid Flight Inspections
- Flight Service Stations
- Air Navigation Aids

This program comprises all elements of the national civil air transportation system related to the operation of the way. Annex A contains individual program descriptions.

AUTHORITY

The National Transportation Act and the Aeronautics Act are the principal Acts governing the Air Transportation Program. The Aeronautics Act requires the Minister of Transport to control and regulate civil aviation, to supervise all matters connected with civil aviation, and to develop, maintain and operate air navigation, surveillance and control services.

OBJECTIVES

The primary objective of this program is to assure the safe and efficient movement of civil aircraft in Canadian and adjacent international airspace.

BENEFICIARIES

The principal benefit is the development and operation of air navigation and flight services necessary to permit the safe and efficient movement of civil aircraft within Canadian airspace. The major beneficiaries are the civil air carriers, business and general aviation aircraft operators, the Department of National Defence (DND), and the general public.

EXPENDITURES (85/86)

($000)	**Air Navigational Services**	**Aircraft Services**	**TOTAL**
CAP	155,299	14,463	169,762
O&M	353,103	16,250	369,353
Transfer	1,303	-	1,303
Total	509,705	30,713	540,418
Revenue	108,724	-	108,724
Net Cost	400,981	30,713	431,694
% Cost Recovery	21	-	20
Person-years	5,890	220	6,110

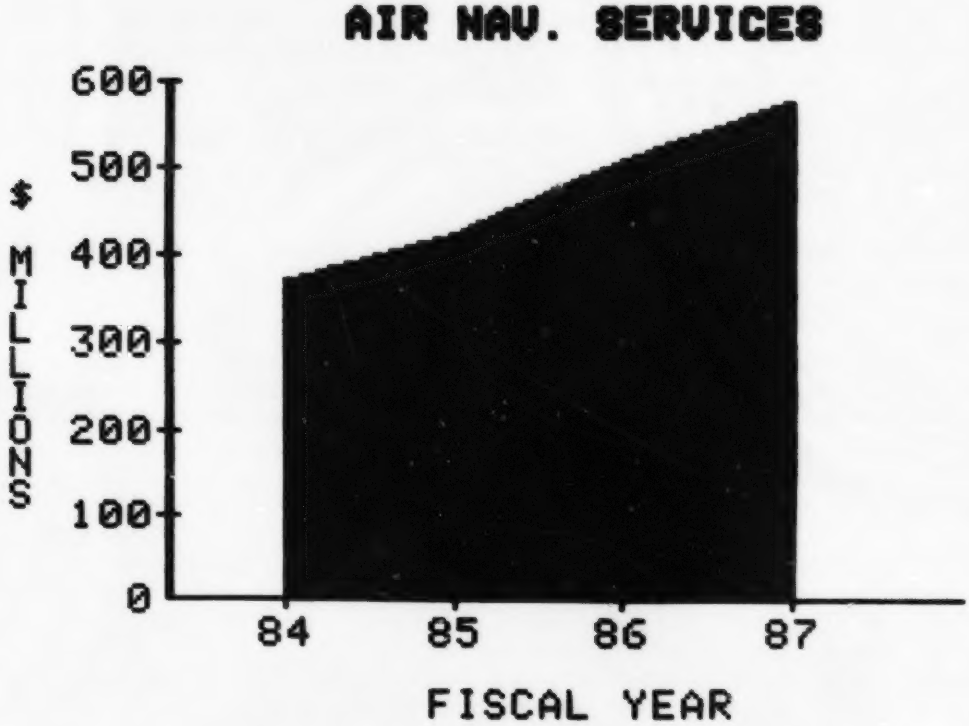
These dimensions show an estimate of that part of the Aircraft Services Activity devoted to civil aviation operations.

Notes: Currently, 14.4 per cent of the revenue generated by the air transportation ticket tax is credited to civil aviation operations. In 1985/86, it is estimated this revenue will be approximately $42 million.

Revenues are also received from international flights on the north Atlantic and polar air routes, and from air carriers' use of the air telecommunication facilities. These two types of activities are expected to generate revenue of some $14 million in 1985/86.

A significant portion of the total revenue is a charge-back to the self-supporting airports related to air traffic services for terminal control purposes. The charge is based on the costs of air traffic control towers and other air navigation facilities at an airport, as well as the costs of facilities which provide essential navigational services to aircraft approaching and departing the airport. In 1985/86, this internal transfer will account for about $53 million of the total revenue.

The 1985/86 estimated net expenditure represents more than a 60 per cent increase over the 1983/84 actuals ($401 million vs $244 million). Moreover, expenditures are expected to continue to increase, although not as dramatically, over the period to the year 2000. To illustrate this latter point, six relatively large ANS capital programs have a total of $1,185 million proposed but represent a commitment to future years of $1,040 million. The following graph showing past and forecast total expenditures for the Air Navigation Services activity will help to demonstrate the former point.



OBSERVATIONS

Civil aviation operations is the title given to the group of programs that comprise federal involvement in the air way system.

For ease of reference, it might be helpful to think of the program in six parts:

a. **Flight service stations** - for the provision of advisory information;

b. **Air traffic services** - for the control of air traffic and made up of control towers, terminal control units and area control centres;

c. **Air navigational aids** - providing assistance for the aircrew in navigating from one point to another;

d. **Air surveillance aids** - for the assistance of air traffic services and the aircrew in determining the location of the aircraft;

e. **Telecommunications** - for communications air to ground and on the ground between air traffic controllers, etc.; and

f. **Aviation weather service** - to provide aviation weather information, especially for terminal points.

To complete the picture, there are two professional groups of Transport Canada technical experts involved: the staff engaged in flight services and air traffic services, and the staff engaged in the design, procurement, installation, calibration and maintenance of the electronic equipment.

The air traffic services operation has grown at a phenomenal rate since the early 1960s. This growth has been sustained in part because of the perceived importance of the service for safety which has meant that air traffic controllers have almost always been given an exemption when "across the board" cuts were made by Treasury Board.

No serious attempt has been made to allocate the costs of the air way system to the different users of the system. As a consequence, all of the costs are notionally ascribed to commercial air services, and thus to the passengers who use commercial air carriers.

There is a marked lack of formally approved policies, standards and guidelines for facilities and services and only perfunctory use of benefit/cost analysis.

In summary, the growth of air way infrastructure and services has not been constrained either by the discipline of cost recovery or the need to adhere to practices, standards, or guidelines based on competent benefit/cost analyses. Moreover, the lack of policies and standards (e.g. cross-wind runway criteria, runway separation standards) has a direct impact on costs for the federal government and for users (aircraft operators) at some airports that has not been discussed in this profile.

KEY ISSUES

To what extent and how should costs of services and facilities in support of the airway system be controlled?

To what extent and how should the costs of the airway system be allocated and recovered?

ASSESSMENT

The rapidly escalating cost of the airway system is one of the most problematic issues facing the federal government in its efforts to provide for safe and efficient air transportation system at a reasonable cost.

In a number of instances where the program managers have identified means of realizing cost savings, for example, by closing air traffic control towers or flight service stations, little has been achieved because the government and the public are not aware of, or do not accept the difference between, facilities installed solely for safety reasons and those that safely increase capacity or enhance reliability. Unless this fundamental problem is addressed, the costs of the airway system will escalate at an accelerated pace as it is unlikely that cost recovery initiatives or the publication of policies, standards or guidelines will have a real impact. For example, there are air traffic control towers and flight services stations that cannot be justified as an operational requirement now and should be closed. This same argument is true for the retention and provision of navigational and surveillance aids.

Related to this issue is the need to deal with the overstaffing that currently exists in air traffic services. It is estimated that the department has in the order of 150 IFR controllers and 70 VFR controllers over requirements. However, the department does not seem prepared to take action but rather appears inclined to rely on attrition taking care of the problem.

With respect to cost recovery, the fundamental issue is the source of revenue. At the present time, Transport

Canada is considering both to the utilization of the air transportation tax and to introduction of an enroute fee. The study team favours use of the air transportation tax because of the belief that it is virtually impossible to allocate the air way costs to be borne by commercial air operators equitably to the users. In addition, so as to impose some reasonable burden on the corporate commercial user, the study team proposes that an annual fee be established for corporate aircraft based on the weight and propulsion of the aircraft. This mechanism may also be applicable to private general aviation.

In summary, it is the study team's view that the principle source of revenue for the airway system should be the air transportation tax supplemented by the existing polar and north-Atlantic telecommunications fees, cost recovery by journal voucher for military aircraft (including executive flights), an annual fee for commercial general aviation, and fuel tax revenues.

The study team does not believe that an enroute fee is a viable alternative for three major reasons:

a. Even with the proposed automation in air traffic services, the administration of an enroute fee would be problematic.

b. The introduction of an enroute fee could have safety implications, especially if small aircraft operators avoid filing flight plans, reporting positions, etc. so as not to pay the fee.

c. The introduction of an enroute fee would be contrary to the U.S. approach and, given the integrated nature of airspace management, this would lead to serious concerns and the potential for retaliatory action, perhaps to the detriment of the Canadian public and almost certainly to the detriment of Canadian air carriers.

With respect to the number and location of area control centres, taking into account existing facilities and staffing and having regard for the substantial costs that would be associated with protection for catastrophic failure should elimination of a western centre be contemplated, it would seem that the only potential for consolidation is in eastern Canada. The important role played by Gander in north-Atlantic control indicates that the centre at Moncton should be considered for closure when the improvements from the radar modernization are implemented.

It is the view of the study team that, insofar as terminal control units are concerned, as many as possible, likely all except Calgary, Ottawa and Halifax, should be repatriated to the appropriate area control centre as soon as the radar modernization program provides digitized primary radar.

There are many policies, standards, and guidelines that flow from the department's electronic equipment maintenance philosophy. These should be reviewed on a continuous basis to ensure that savings from new technology are fully reflected in the department's budget. For example, the frequency with which airborne calibration of navigational aids is required appears excessive when compared to the standards of other countries. It could be reduced. Overall, given the amount of electronic equipment maintained, even small adjustments could result in significant savings.

The preparation of the Canadian Airspace Review and the participation of Transport Canada in ICAO's "Future Air Navigation Systems" commmittee are commendable planning initiatives but the former is overly detailed and thus overly resource intensive.

To summarize, Transport Canada must get control of its costs in a service where capacity is often confused with safety, where public concerns (sometimes uninformed) often outweigh sound technical advice, and where the discipline of financial self-sufficiency has not been imposed nor could it be, as all of the mechanisms necessary for its imposition are not available.

OPTIONS

The study team has developed more specific proposals in respect of this program than for other programs because of our perception of the magnitude of the problem, and because of a concern that in this highly technical area the government will have difficulty in establishing the improvements in program delivery that are necessary and justified without detailed guidance. The overall thrust of the study team's conclusions is cost-containment through a combination of limits on funding, the use of benefit/cost analyses to establish commissioning and decommissioning criteria for services as well as surveillance and navigational aids, and downsizing.

The study team recommends to the Task Force that the government consider the following:

1. Downsizing the operations of the Air Navigation Services activity by:

    a. centralizing the management of air traffic services under the Director, Air Traffic Services with Air Administration Regional Offices providing administrative support only;

    b. undertaking a communications program to educate the public on the need for, the costs of, and the criteria for commissioning, decommissioning and establishing the hours of operation for air traffic control towers and flight service stations;

    c. implementing a plan incorporating public information strategies to close, over the next nine months, air traffic control towers and flight service stations meeting the decommissioning criteria;

    d. implementing a plan incorporating public information strategies to reduce the hours of operation of air traffic control towers commensurate with the traffic volume, and recognizing the availability of flight service station personnel;

    e. implementing a plan to relocate staff currently surplus and staff that will become surplus as a result of the air traffic control tower and flight service station closures utilizing the same techniques to minimize employee hardship as are available to other employees in the Public Service;

    f. ensuring that no new air traffic control towers or flight service stations are approved unless the establishment criteria are satisfied;

    g. endeavouring to automate as many flight service stations as feasible and where possible consolidating the operations of the remainder through the use of remote operations from a hub;

h. contracting out the operation of flight service stations to the private sector on a national, regional or route network basis;

i. determining on the basis of benefit/cost analyses whether flight service station operators should be trained at the Transport Canada Training Institute (TCTI) or by the private sector; and

j. exploring the possibilities of contracting out the operations of air traffic control towers where only visual flight rules (VFR) traffic is being handled.

2. Improving the cost-effectiveness of the Air Navigation Services activity by:

   a. establishing on the basis of benefit/cost analyses and publishing criteria for the commissioning and decommissioning of all aids to air navigation, and air traffic surveillance facilities;

   b. establishing and publishing criteria for the provision of air to ground communications facilities and, for the availability of aeronautical weather services;

   c. adjusting the space and finish standards for the construction of area control centres, terminal control units, air traffic control towers and flight service stations to functionally utilitarian;

   d. pursuing adjustments to maintenance schedules, to standards for the provision of stand-by equipment and to the co-location of electronic facilities;

   e. making greater use of the private sector through contracting for maintenance of non-sophisticated remote navigational aids such as NDBs, and peripheral communications facilities; and

   f. contracting for the provision, operation and/or maintenance of aircraft used for airborne inspection and calibration, where such is cost-effective.

3. Assigning the responsibility for developing benefit/cost methodology and for conducting benefit/cost analyses in support of the Air Navigation Services and the Aircraft Services Activities to a corporate unit divorced from operational interests.

4. Reviewing the radar modernization program and confirm that benefit/cost analyses based on current traffic forecasts justify all installations, especially those involving primary radar.

5. Before receiving authority to procure any new or replacement air navigational or surveillance aids, demonstrating that the benefits exceed the costs.

6. Reducing the Canadian Airspace Review in detail and accelerate its completion so that it can be used to define the operational requirement and can be coupled with the Canadian Airspace Systems Plan to provide a framework for air way expenditures over the next 15 years.

7. Reviewing, with a view to reducing, its standards for the airborne flight checking of air navigational and surveillance aids.

8. On the basis of information available and in consultation with the industry associations and DND, allocating the costs of the air way system (including air traffic services, air navigational aids, etc.) among: commercial air carriers; commercial general aviation; private general aviation; military; and establish short term cost-recovery targets for each category.

9. Where satellite airports have been provided or are available, impose landing fees on general aviation users of the primary airport that reflect the costs imposed by such operations on the air way and the airport system.

10. At least as a bookkeeping entry, charge the cost of terminal services such as navigational and surveillance aids and air traffic control towers (but not terminal control units) to the individual airport served.

11. Using the air transportation tax plus other way user fees to fund all air way improvements for commercial carriers, and not introduce an enroute fee.

12. Over the next five years, reducing expenditures on the Air Navigation Services activity to the revenues that are available in support of that activity plus an appropriation to cover any imposed public duty.

13. Improving the effectiveness of its telecommunications design, construction and maintenance support service by consolidating air and marine electronics staff.

14. Placing greater emphasis on the provision of aviation weather services, and ensuring that a minimum of 12 months notice of any reduction in Environment Canada's operations that would affect the availability of aviation weather services is given.

15. Commencing now to plan for the closure of the area control centre at Moncton at the time of installation in Toronto, Montreal and Gander of the equipment procured under the Radar Modernization Program.

16. Commencing now to plan for the repatriation of as many terminal control units as feasible to the appropriate area control centre at the time of installation of the primary radar digitization equipment procured under the Radar Modernization Program.

PROGRAM DESCRIPTIONS

CIVIL AVIATION OPERATIONS

Air Transportation Tax (Civil Aviation Operations Portion): This tax is one of several direct sources of revenue used to help pay for Canadian aviation facilities and services.

Aeronautical Flight Safety Aids: Electronic navigational aids, communications, VFR (Visual Flight Rules) flight planning, aeronautical and meteorological briefings, search and rescue support services, and other safety services and facilities are provided for the aviation community through flight service stations.

Aircraft Search and Rescue Alert: The administration notifies and assists appropriate organizations with aircraft in need of search and rescue aid, by alerting those in charge of crash equipment, ambulances, doctors, and other safety search personnel.

Air Traffic Control: The administration is responsible for the movement of air traffic and provides air traffic control service to aircraft operating in Canadian controlled airspace and international controlled airspace for which Canada has accepted responsibility.

Airports and Area Control Services: Air traffic control service is provided by control towers to aircraft operating on and in vicinity of airports, and by terminal control units and control centres to aircraft operating in controlled airspace under the Instrument Flight Rules or Controlled Visual Flight Rules.

Airspace Management: The air administration is responsible for the development of Canada's airspace, navigation aids, and aeronautical communication facilities in order to meet the forecast demands of the aviation public.

Airspace Reservation Service: Services and information are provided by air traffic control to reserve airspace for specified air operations in controlled airspace.

Navigation Aid Flight Inspections: The air administration is responsible for navigation aid flight inspection services for instrument landing systems, VHF, omni-ranges (VOR), radar and non-directional beacons (NDB) facilities owned and operated by the Department.

Flight Service Stations: The air administration is responsible for providing preflight, inflight, and post-flight information services to assist aviation pilots in completing their flights in safety.

Air Navigation Aids: The air administration provides facilities and services for air traffic navigation and control. It also provides VHF (Very High Frequency) direction-finding assistance, on request to aircraft operating within the range of equipped stations.

AIRPORT OPERATIONS

DESCRIPTION

Air Transportation Tax (Airports Portion)
Airport Facilities
Crash, Firefighting and Rescue Services
Airport Marketing Programs
Airports Operations/Simulation Models
Airport Security
Airports Services Programs
Financial Assistance to Construction and Operation of Non-Federal Airports
Airport Facilities and Airport Services

These programs comprise all elements of the national civil air transportation system related to airport operations. Annex B contains individual program descriptions.

AUTHORITY

BNA, National Transportation Act and Aeronautics Act.

OBJECTIVES

The overall objective is to foster and promote the development and operation of a safe and efficient national civil airports system that enables all areas of Canada to have reasonable access to air transportation, and that contributes to the achievement of government objectives.

BENEFICIARIES

Major clients/users are domestic and international air carriers as well as the general aviation sector. Major beneficiaries are the travelling public and the business community (e.g. tourism, cargo, mail, etc.).

EXPENDITURES (85/86)

($000)	**Self-Supporting Airports (9)**	**Others (144)**[1]	**Total**
Cap	93,086[2]	140,776	233,862
O&M	155,042	189,182	344,224
Transfer	-	47,846	47,846
Total	372,595[4]	377,804	750,399
Revenue	459,787[6]	143,817[3]	603,604[3]
Net Cost (Profit)	(87,192)[4]	233,987	146,795[4]
% Revenue/Cost	123	38	80[5]
Person-years	1,948	2,985	4,933

[1] Includes $47,846,000 in contributions to 52 non-Transport Canada airports.

[2] Includes a capital expenditure of $7,198,000 from budgetary appropriations.

[3] Includes cost recovery of $37,598,000 from SSA for activity-wide services.

Includes 85.6 per cent of the revenues from the air transportation tax.

[4] Does not include depreciation of $57,758,000.

[5] No provision is made for interest on the federal government's investment in airports infrastructure. Includes costs related to state and military aircraft.

[6] Includes 85.6 per cent of the revenues from the air transportation tax.

Notes: The airports programs account for some 23 per cent of Transport Canada's total person-years.

The airports activity is divided into two categories: Self-Supporting Airports (SSA) and Other Airports. As of April 1, 1985, there are nine airports in the first category, including all of the international airports except Gander, plus Dorval and Ottawa which are national airports. Gander, the remaining 10 national, and 133 regional and local airports are grouped together in the second category along with subsidization costs for 52 non-TC airports. Annex C contains a summary explanation of the Self-Supporting Airports concept, and Annex D a description of the airports classification system.

Between April 1979 and March 1985, there were 23 airports in the Airports Revolving Fund. These airports achieved cost recovery levels (including depreciation and imputed interest) ranging between 65 per cent and 85 per cent. The nine airports now in this group will achieve more than full cost recovery on a cash flow basis in 1985/86 as shown previously in the Expenditures.

Federal airports overall will recover 80 per cent of their total costs (O&M and capital excluding depreciation and interest on investment, and including costs associated with the operations of state and military aircraft) in 1985/86, the best performance for a major TC program.

The provision of capital funds from appropriations for airport expenditures at SSAs is in recognition of the exceptional circumstances that dictated the need for this investment. This is a practice that reflects the philosophy of payment from budgetary appropriations for works undertaking an imposed public duty.

OBSERVATIONS

Although there are over 1,300 airports in Canada, the majority, some 1,250, are local commercial or local. The remaining number is made up of eight international, 12 national and 51 regional airports.

Since the 1920s, the federal government has assumed a dominant role in the ownership and operation of airports, particularly the larger airports, through appropriations rather than through legislation, without a clearly enunciated overall objective.

Transport Canada now owns 153 airports, and operates 103 of these either directly or through management contracts. The federal government operates all of the international and national airports, 34 regional airports, 36 local commercial and four local airports. The other 50 are operated by others, mainly municipalities, with a subsidy being provided to cover the difference between revenues and operating costs, and contributions being provided for capital improvements.

The involvement of the federal government in the national civil airports system is more striking when it is recognized that the SSAs serve in the order of 80 per cent of the passengers, produce 81 per cent of the revenues, and collectively produce a cash surplus of $87 million. Moreover, all except Mirabel produce a cash operating surplus and Dorval, Toronto, Calgary, Edmonton and Vancouver have a net cash surplus. The airports in the "Other" category serve 20 per cent of ther passengers, produce only 15 per cent of the revenue, but cause 48 per cent of the expenditures.

Canada is virtually unique in the western world in its degree of involvement in the direct operation of airports. For example, in the U.S., local authorities are the accepted model for airport ownership and operation.

While it is generally agreed that the federal airports system works well, many of the airports are overbuilt in both size and quality resulting in high capital and O&M costs.

Asset value and financial viability vary greatly among federal airports. Some are or could be profitable such as those designated as self-supporting, but the majority require, and are likely to require, ongoing subsidization, at least for capital improvements.

Several features that characterize the federal government's management and operation of airports such as excessive overhead, extensive checks and balances, rich and uniform standards regardless of need, expensive and inflexible labour agreements, lack of incentives to improve productivity, etc. make it difficult either to reduce expenditures or increase revenues. This results in a significantly more costly system than necessary. By contrast, U.S. and the relatively few non-federally operated regional airports in Canada operate in a commercial, business-like manner and thus are more cost-efficient and responsive to local market needs.

A major Transport Canada study in the early 1980s recommended a more decentralized, commercially-oriented management structure for some or all federal airports. This proposal was the subject of some external consultation that raised a number of concerns: a general reluctance to change the status quo ("if it isn't broken, don't fix it!"); reduction in federal presence; skepticism regarding forecast financial viability (especially since all of the figures are based on forecasts of traffic which TC was perceived to have overestimated in terms of facility expansion); loss of federal employment; union fears of loss of membership; disagreement with specifics of the proposed management model; etc.

For several years, little public mention was made of the issue but in a May 1985 budget paper, reference is made to the management of airports: "... the government will pursue the development of a new management structure for the federal airport system in Canada. Options will be presented for consideration this year to provide for a self-sustaining system, incorporating the principle of cross-subsidization of smaller airports, which will allow for the independent operation of local airports." TC is currently developing options that will be presented to the Cabinet in respect of this commitment. It is noteworthy, however, that reference to a self-sustaining system is a potentially serious constraint.

Financial cross-subsidization presently occurs through a distribution of 86 per cent of the air transportation tax to airports according to annual enplaned passengers, and nationally through inclusion of airports that more than recover their costs and those that do not in the Airports Revolving Fund. At the same time, alternate or satellite airports that have been built as relievers for the major airport serving the community are not being cross-subsidized by the revenues generated by that major airport.

Some communities and provinces are against any devolution of the current federal responsibility for airport management. Other communities appear eager to act as pilots for any scheme involving more local control the government may wish to test.

Several leaseholders feel the "Reversionary Clause" in TC airport leases is unfair since leasehold improvements revert to the Crown. This makes financing of such improvements very difficult to arrange and dampens investment.

KEY ISSUES

How can the cost of providing, operating and maintaining airports be reduced?

What should be the minimum essential federal role in the operation of airports?

If the federal government were not to continue to own and operate the larger airports, how could national security and safety at airports be assured?

What other responsibility for service or for national concerns at airports should the federal government retain?

If there should be cross-subsidization among airports, how should it work?

What financial arrangements should apply (a) if there is transfer of responsibility? (b) on an ongoing basis?

How could the aviation and non-aviation-related revenues be increased?

How should any change in responsibilities for airport ownership or operation be implemented?

ASSESSMENT

In the view of the study team, it is clear that the operation of airports by the federal government has led to overbuilding, unjustifiably high levels of service, and insufficient attention to cost recovery. At the same time, air carriers claim to have had no meaningful input into decisions on the need for new or refurbished facilities, the capacity of facilities and standard of finish, the levels of service proposed, etc.

There are many reasons for this situation but it should be acknowledged that, in recent years, some of the problem has been related to factors outside of the control of program managers, e.g. the '6 and 5' program that interrupted progress was being made in achieving cost recovery objectives, the Special Capital Recovery Program that led to the initiation of capital improvements, etc. These relatively recent considerations, however, should not be allowed to overshadow the fact that adherence to national standards and fee setting, the demand for capital improvements that is an intrinsic feature of government ownership, failure of Treasury Board (as the employer) to negotiate flexibility in collective agreements for cross-utilization of personnel, etc. have played a substantial role in the evolution of the current costly system.

In view of the advantages of local operation in tailoring the facility to the needs of the community, the federal government should strive to decrease its involvement in airports. This process, however, will undoubtedly be lengthy and time-consuming, and will require resolute determination if progress is to be made.

To assist in moving towards this goal, the federal government should, the study team believes, start by reducing the cost of operating its airports. The aim would be fully functional but more utilitarian airports where investments are matched to needs and means.

Concurrently, the government could initiate other steps to create an environment that will foster the formation of "local authorities" organized along corporate lines, to operate larger airports and, where applicable, their satellite and secondary airports in a commercial, business-like manner. While developing and encouraging the adoption of this model for smaller airports as well, it should also seek to involve other levels of government in the operation of smaller airports or groups of smaller airports.

During the divestiture negotiations, the federal government should be flexible on the arrangements for transfer, including the financial aspects, recognizing the need to tailor them to the specific circumstance. In each instance, however, the objective should be to minimize the residual financial burden imposed on the federal government having due regard for the substantial investment that has been made in the infrastructure by the federal taxpayer.

In proposing the implementation of the foregoing approach, it should be made clear that the federal government will have continuing responsibility in a number of important areas:

- Transport Canada will maintain safety standards through the licensing of airports;

- Transport Canada will maintain security standards through the licensing of airports;
- Transport Canada will continue to ensure the integrity of the national air navigation and air traffic control
- Transport Canada will specify performance standards for crash, firefighting and rescue services (but will leave implementation to local authorities), monitoring compliance as part of the licensing process;
- Transport Canada will continue to provide airport air traffic facilities and services but with user input and with on-site costs borne by the relevant airport authority; and,
- the federal government will continue to provide and fund facilitation services (customs and excise, immigration, health and agricultural inspection) and to set national service requirements, e.g. official language service, accessibility, etc.

Also, the study team suggests the federal government state that it will use the airports portion of the air transportation tax to cross-subsidize airports that are not viable, whether federally or non-federally owned and/or operated.

In the interim, and for airports that will continue to be operated by the federal government, strenuous efforts will be needed to reduce costs and increase revenues. For this purpose, meaningful but attainable cost recovery targets should be set annually for each airport or grouping of airports. To this end, strategies would need to be developed for decreasing the average O&M cost by 20 per cent and the overhead costs by 30 per cent. Revenue, other than from the air transportation tax, could be increased, initially by 10 per cent annually. The ultimate (very long range in some cases, and unattainable in others) goal should be full cost recovery with non-air transportation tax revenue.

Other steps such as permitting leaseholders to buy out their "Reversionary Clauses" or allowing for leasehold improvements to be sold on lease termination could generate additional revenue.

In the view of the study team, to further encourage investment on airport lands, "Reversionary Clauses" should be foregone or should only be used for investments amortized over periods longer than 30 years.

With respect to the air transportation tax, the study team believes that the original allocation based on pro-rating according to enplaned passengers using federal airports is not appropriate in the case of federal airports and not equitable in the case of non-federal airports. Accordingly, it is proposed that the allocation of the tax be changed so as to reduce the amounts available to the large airports and increase the amounts to smaller airports and used for the subsidization of O&M costs. In addition, an appropriate portion of the air transportation tax revenues could be held in a fund to be used for cost sharing of capital projects at airports that fully recover their O&M costs from national fees and non-aviation revenue. To accomplish these objectives, the revenue from the tax would not be allocated according to a rigid activity formula but on the basis of need.

The Study Team on Real Property Management concluded that a change from federal to local, non-federal ownership and operation of airports is desirable, but their conclusions differ from the study team's in several details related to the responsibility for funding air traffic services, and for subsidies to non-viable airports. In addition, the Study Team on Real Property Management proposed only a temporary allocation of the air transportation tax to local airport authorities.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Announcing federal government willingness to reduce involvement in airports by stating that it is prepared to consider negotiating agreements with willing communities, territorial/provincial governments, municipalities, private companies, etc., and, at the same time, stating clearly the continuing federal role at airports in aviation safety, security and other matters.

2. To build momentum, establishing and mandating a separate unit with appropriate government expertise and

free access to private sector specialists both to negotiate Local Airport Authority agreements with willing entities, and to discuss arrangements for the transfer of smaller airports or groups of smaller airports with willing provinces/territories.

3. Ensuring that transfer arrangements include all of the federal airports serving the community.

4. Ensuring that the costs of terminal navigation aids, aviation weather facilities, and air traffic control services are charged to the individual airports they serve.

5. In consultation with air carriers and the communities reducing the cost of airport operations so as to achieve a saving of 20 per cent by such actions as reducing crash, firefighting and rescue performance and staffing standards to more modest but still safe levels; setting lower maintenance and cleaning services standards; cross-training and cross-utilizing personnel; etc.

6. Ensuring that a positive benefit/cost analysis justifies every capital investment and capital contribution for new and improved airport facilities or services.

7. Reducing Transport Canada overhead costs for airport operations by 30 per cent.

8. Setting annual revenue targets for each airport to be met by vigorous pursuit of commercial marketing aided by setting up a capital fund for revenue-generating projects so as to increase non-aviation revenues initially by 10 per cent annually.

9. Announcing that the allocation of revenues from the air transportation tax will be changed effective April 1, 1986, so as to increase the proportion available for smaller airports, limit the formula based contribution to O&M subsidization, and create a capital projects fund for airports that would be available for cost sharing capital improvements on the basis of need.

10. Negotiating the transfer of custody and management of federally-owned airports/groups of airports to willing local entities or provinces/territories to operate

along commercial lines by packaging and tailoring transfer and ongoing financial arrangements to the specifics of each case; by ensuring local authorities have maximum flexibility in deciding labour staffing levels, wage rates and work rules on assuming operating responsibility (special labour force adjustment programs may have to be developed specifically for this purpose); by paying operating subsidies, at reduced levels and reviewable periodically, only to airports which clearly cannot recover their operating costs from on-site revenues; by using the "capital" air transportation fund to cost share fully justified non-cost recoverable projects and to provide for cash advances on cost recoverable projects; and by transferring assets of the federal government only when appropriate financial arrangements can be negotiated.

11. In the longer term, if no local party is interested in taking over a particular airport and it must be kept operating, offering the airport for operation on a lease or contract basis. If the airport is not required for national transportation purposes, and no party is prepared to operate it, Transport Canada should close it down.

12. Examining the feasibility of eliminating the requirement for Reversionary Clauses, of using these clauses only in very long-term leases, of entering into early buy-out or eventually selling leasehold improvements, so as to encourage private sector investment on airport lands.

Although the study team has a very decided preference for, and strongly recommends the foregoing approach, if the federal government is not prepared to transfer the responsibility for management of individual airports to others because of concerns that have previously arisen, even though there is a logical response to each of these, an alternative plan should be considered along the lines of the study team's proposed ports system with a national holding company (Crown corporation) for financial administration, with local management corporations for each international and national airport (together with satellite and secondary airports serving the same domestic market area), and a management corporation for the other airports that need to continue in operation as part of the national airports system. In this alternate scheme, local airports should be transferred to the provinces, offered to the communities to operate, or closed down.

PROGRAM DESCRIPTIONS

AIRPORT OPERATIONS

Air Transportation Tax (Airports Portion): This tax is one of several direct sources of revenue used to help pay for Canadian aviation facilities and services.

REV = $179,931,000

Airport Facilities: The air administration provides standards and technical advice regarding the planning, design, costing, scheduling, construction, procurement, operation, and maintenance of airport-related facilities mobile equipment, and environments.

PYs = 3,704	CAP = $279,400,000 O&M = $595,357,000

REV: See Airport Marketing Programs

Crash, Firefighting and Rescue Services: At designated Canadian airports the National CFR Program provides crash, firefighting, and rescue services for the protection of persons, aircraft, and property.

PYs = 743	CAP = $22,870,000 O&M = $33,425,000

REV: See Airport Marketing Programs

Airport Marketing Programs: The Airports and Construction Directorate is responsible for airport marketing programs, including the development and promulgation of policies, standards, and guidelines; the development of revenue-generating contracts; advertising; and other customer-related programs.

PYs = 162	O&M = $ 5,802,000 REV = $267,555,000

Airports Operations/Simulation Models: The air administration maintains four computerized simulation models designed to assist in airport planning by facilitating the production of detailed forecast schedules, the analysis of gate utilization under varying operational rules, and the analysis of passenger and baggage flows through variable terminal configurations.

Resources subsumed in Airport Facilities and Airport Services.

Airport Security: At designated Canadian airports, the National Airport Policing and Security Program provides policing and security services for civil aviation security, protection of assets, safety and regularity of airport operations; and traffic and law enforcement services to support the safe and orderly movement of people, goods, vehicles, and aircraft.

PYs = 58 O&M = $28,613,000
REV: See Airport Marketing Programs.

Airports Services Programs: The Airports and Construction Directorate is responsible for the development of policies, standards, guidelines, and programs that ensure the provision of safe and efficient airport services.

Resources subsumed in Airport Facilities and Airport Services.

Financial Assistance to Construction and Operation of Non-Federal Airports: Provides municipalities and other public bodies with financial assistance for the construction and operation of airports. This program provides for operating subsidies at airports that are of significance to the national air transportation program. The policy also permits the funding of 100 per cent of the cost of approved capital projects at these airports.

PYs = 8.4 O&M = $258,000
TRANSFERS = $ 40,824,000

Airport Facilities and Airport Services: See also Airport Facilities, Airport Operations/Simulation Models and Airport Services Programs.

PYs = 3,704 CAP = $279,400,000
O&M = $595,357,000

ANNEX C

SELF-SUPPORTING AIRPORT OPERATIONS AND THE AIRPORTS REVOLVING FUND

The objective of the Airports Revolving Fund is to finance the costs for the development and operation of those international airports designed as Self-Supporting Airports from revenues generated by these airports.

The Airports Revolving Fund is a financing mechanism which provides non-lapsing authorization by Parliament to make payments out of the Consolidated Revenue Fund for capital acquisitions and for temporary financing of operating deficits for airports designated to be included in the Revolving Fund.

The fund is expected to generate revenues, including an apportionment of the air transportation tax, that are sufficient to cover the full costs of operating the designated self-supporting airports. These costs include all direct, indirect and overhead items plus an annual amount sufficient to amortize the cost of capital acquisitions over their useful lives.

The fund may receive annual appropriations to cover certain capital acquisitions, where such arrangements have been approved by Treasury Board through the fund's annual financial plan. Annual appropriations may also be provided to cover the costs of activities that are not to be recovered from users.

On April 1, 1985, the number of airports in the fund was reduced from 23 to nine.

AIRPORT CLASSIFICATION

International Airport

An "International Airport" is an airport designated by Canada as an airport of entry and departure for international traffic, where Customs, Immigration, Public Health, Animal and Plant Quarantine and similar procedures are conducted. It must also meet the following conditions:

a. The airport is included in an ICAO Regional Air Navigation Plan as an airport for regular use by international scheduled air transport (REG-S).

b. The airport is designated by Revenue Canada, Customs and Excise under Memorandum D9 as a Class 4 (International Airport) airport of entry.

c. The airport supports a CTC Class 8 direct unit toll service to a foreign airport beyond the United States.

All of the international airports are owned and operated by Transport Canada.

Site Name

Calgary International, Alberta
Edmonton International, Alberta
Gander International, Newfoundland
Halifax International, Nova Scotia
Montreal International (Mirabel), Quebec
Toronto (L.B.P.) International, Ontario
Vancouver International, British Columbia
Winnipeg International, Manitoba

National Airport

A "national airport" is:

- the major airport serving each provincial or territorial capital, if the major airport is not in the international airport class; or
- an airport supporting CTC Class 1 single plane service to at least four international airports

such that the international airports are not served sequentially.

All of the national airports are owned and operated by Transport Canada.

Site Name

Charlottetown, Prince Edward Island
Fredericton, New Brunswick
Montreal (Dorval), Quebec
Ottawa, Ontario
Quebec, Quebec
Regina, Saskatchewan
Saint John, New Brunswick
St. John's, Newfoundland
Saskatoon, Saskatchewan
Victoria, British Columbia
Whitehorse, Yukon
Yellowknife, Northwest Territories

Regional Airport

A "regional airport" is an airport that supports:

- CTC class 1 single plane service to a national or international airport; and
- CTC Class 1, 2, 3, 8, 9-2, or 9-3 direct non-stop service to at least three other airports.

The regional airports owned, or owned and operated, by Transport Canada are:

Site Name	**Owner/Operator**
Baie-Comeau, Quebec	TC
Campbell River, British Columbia	TC/Municipality
Castlegar, British Columbia	TC
Charlo, New Brunswick	TC/Municipality
Churchill, Manitoba	TC
Cranbrook, British Columbia	TC/Municipality
Deer Lake, Newfoundland	TC
Dryden, Ontario	TC/Town of Dryden
Fort Nelson, British Columbia	TC
Fort St. John, British Columbia	TC
Fort Simpson, Northwest Territories	TC

Site Name	Owner/Operator
Goose Bay, Newfoundland	TC
Grande Prairie, Alberta	TC
Hay River, Northwest Territories	TC
Inuvik, Northwest Territories	TC
Kamloops, British Columbia	TC
Kelowna, British Columbia	TC/Municipality
London, Ontario	TC
Lynn Lake, Manitoba	TC/District of Lynn Lake
Moncton, New Brunswick	TC
Mont-Joli, Quebec	TC
Norman Wells, Northwest Territories	TC
North Bay, Ontario	TC
Peace River, Alberta	TC/Municipality
Penticton, British Columbia	TC
Port Hardy, British Columbia	TC
Prince George, British Columbia	TC
Prince Rupert, British Columbia	TC
Rouyn-Noranda, Québec	TC/Municipality
Sandspit, British Columbia	TC
Sault Ste. Marie, Ontario	TC
Sept-Îles, Quebec	TC
Stephenville, Newfoundland	TC
Sudbury, Ontario	TC/Municipality
Sydney, Nova Scotia	TC
Terrace, British Columbia	TC
The Pas, Manitoba	TC
Thompson, Manitoba	TC/Municipality
Thunder Bay, Ontario	TC
Timmins, Ontario	TC
Uranium City, Saskatchewan	TC/Sask. Dep't of Highways
Val d'Or, Quebec	TC
Wabush, Newfoundland	TC
Watson, Lake, Yukon	TC
Windsor, Ontario	TC

Local Commercial Airport

A "Local Commercial Airport" is an airport that serves as a base or point of call named in a CTC license for a commercial air service, but does not meet the criteria established for the international, national or regional class definitions, or is a satellite to an international or national airport.

The local commercial airports owned, or owned and operated, by Transport Canada are:

Site Name	**Owner/Operator**
Abbotsford, British Columbia	TC
Baker Lake, Northwest Territories	TC
Blanc-Sablon, Quebec	TC/Municipality
Burwash, Yukon	TC/Gov't of Yukon
Cambridge Bay, Northwest Territories	TC
Carp, Ontario	TC/Municipality
Charlevoix, Quebec	TC/Municipality
Chevery, Quebec	TC/Municipality
Coral Harbour, Northwest Territories	TC
Dauphin, Manitoba	TC/Municipality
Dawson Creek, British Columbia	TC/Municipality
Earlton, Ontario	TC
Eureka, Northwest Territories	TC
Flin Flon, Manitoba	TC/Municipality
Fort McMurray, Alberta	TC
Fort Resolution, Northwest Territories	TC/Gov't of N.W.T.
Fort Smith, Northwest Territories	TC
Frobisher, Northwest Territories	TC
Gaspé, Quebec	TC/Municipality
Gillam, Manitoba	TC/Gov't of Man.
Gore Bay, Ontario	TC
Hall Beach, Northwest Territories	TC
Hamilton, Ontario	TC/Municipality
Iles-de-la-Madeleine, Quebec	TC
Kapuskasing, Ontario	TC
Kenora, Ontario	TC
Kuujuaq (Fort Chimo), Quebec	TC
La Ronge, Saskatchewan	TC/Gov't of Sask.
Lethbridge, Alberta	TC
Muskoka, Ontario	TC
Nanaimo, British Columbia	TC/Municipality
Nanisivik, Northwest Territories	TC
Natashquan, Quebec	TC/Village of Natashquan
North Battleford, Saskatchewan	TC
Old Crow, Yukon Territory	TC/Gov't of Yukon
Oshawa, Ontario	TC/Municipality
Pitt Meadows, British Columbia	TC
Quesnel, British Columbia	TC
Rankin Inlet, Northwest Territories	TC/Gov't of N.W.T.
Red Lake, Ontario	TC

Site Name	**Owner/Operator**
Resolute, Northwest Territories	TC
Rimouski, Quebec	TC/Municipality
Rivière-du-Loup, Quebec	TC/Municipality
Roberval, Quebec	TC/Municipality
Sachs Harbour, Northwest Territories	TC/Gov't of N.W.T.
St. Andrews, Manitoba	TC
St. Anthony, Newfoundland	TC
St. Catherines, Ontario	TC/Municipality
Saint-Hubert, Quebec	TC
Saint-Jean, Quebec	TC/Municipality
Sarnia, Ontario	TC/Municipality
Schefferville, Quebec	TC
Sherbrooke, Quebec	TC/Municipality
Smithers, British Columbia	TC
Springbank, Alberta	TC
Swift Current, Saskatchewan	TC
Teslin, Yukon	TC/Gov't of Yukon
Tofino, British Columbia	TC
Tuktoyaktuk, Northwest Territories	TC
Villeneuve, Alberta	TC
Wiarton, Ontario	TC
Williams Lake, British Columbia	TC
Yarmouth, Nova Scotia	TC
Yorkton, Saskatchewan	TC

Local Airport

A "local airport" is an airport that is not named as a base or point of call in a CTC license for any commercial air service.

The local airports owned, or owned and operated, by Transport Canada are:

Site Name	**Owner/Operator**
Mould Bay, Northwest Territories	TC
Hope, British Columbia	TC
Montreal-Cartierville, Quebec	TC
St. Leonard, New Brunswick	TC

AIR TRANSPORTATION INFRASTRUCTURE IN NORTHERN QUEBEC

DESCRIPTION

Construction of Air Transportation Infrastructure in Northern Quebec: To construct airports and install air navigation aids for 14 isolated communities in northern Quebec.

AUTHORITY

Under the terms of an Umbrella Agreement signed on September 27, 1983 with the Province of Quebec, Canada will finance 100 per cent of the costs related to three Cree airports and 60 per cent of the costs for 11 Inuit airports, as well as install, operate and maintain all navigation aids.

OBJECTIVES

While the primary objective may be considered to be access to isolated communities, in point of fact the extent of the federal government's involvement was governed by the requirement to fulfill the federal government's obligations under the James Bay Agreement.

BENEFICIARIES

Benefits relate to the provision of relatively reliable air access to isolated Inuit and Cree communities in Northern Quebec. Beneficiaries are the residents of the 14 communities, the Cree and Inuit populations generally, the Province of Quebec and the two air carriers serving or that will serve those communities, Air Inuit and Air Creebec.

EXPENDITURES (85/86)	**($000)**
CAP	4,979
O&M	547
Transfer	6,623
Total	12,149
Revenue	-
Net Cost	12,149
Person-years1	8

1 Capital person-years.

Notes: Original estimates approved by Treasury Board provided for an expenditure of $64 million for the 11 Inuit airports and the three Cree airports. A further submission was approved by the Treasury Board in the fall of 1984 that increased the authorized expenditure to $82 million. On the basis of the airports under construction, it is probable that the actual costs will be well within the new TEC. If this trend holds, the overall project costs will fall somewhere between the original budget and the revised budget.

The on-site construction to implement the program commenced in 1984/85, and is scheduled to be completed in 1993/94.

OBSERVATIONS

During the negotiation of the James Bay Agreement, a number of commitments were made on behalf of the federal government, one of which was a general commitment to the development of airport facilities to permit year-round access to Northern Quebec Inuit and Cree communities. For the Cree communities, the commitment was given by the federal government, while for the Inuit communities there was a joint federal/provincial undertaking.

For a number of years, the federal government tried to satisfy the commitment by limited ($100,000/site) contributions. Understandably, this approach met with strong resistance and finally in 1983, the federal government signed an agreement with the Province of Quebec that had the support of the Cree and Inuit community leaders.

KEY ISSUES

Should the cost of providing infrastructure negotiated as an element of a program that has as its objective the relief of isolation, and/or regional economic development, and/or natural resource development, be recovered from the users of the air transportation system?

ASSESSMENT

In the view of the study team, given the James Bay Agreement of 1976 and the 1983 federal/provincial agreement, there appears to be little merit in challenging either the basis for the program, or the level of federal involvement.

With respect to the key issue identified in the preceding section, it seems clear that the development of the air infrastructure, and the federal funding of that development, was part of the price paid for concluding the James Bay Agreement. Accordingly, it is suggested that this program (and other programs of a similar nature) should not be part of the costs of the air transportation system to be recovered from the users of that system but rather a cost to be borne by the general public. As discussed in more detail in the Air Transportation Introduction, it is essential for the government to be more sensitive to the need to differentiate between this type of expenditure and those made to meet the legitimate needs of the national civil air transportation system if program managers are to be held accountable for establishing and meeting realistic cost recovery objectives.

Consistent with the general approach to the operation of small airports, the study team proposes that Transport Canada negotiate divestiture of its responsibilities for operating the three Cree airports.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Negotiating a transfer of its obligation to operate the three Cree airports to the province or to the Cree communities.

2. Changing the method of accounting for transportation expenditures in the establishment of cost recovery objectives so that expenditures of the nature covered by this program are paid for from general tax revenues and are not a cost to be assumed solely by the air travelling public.

AVIATION ACTIVITY FORECASTS

DESCRIPTION

Aviation Activity Forecasts: Transport Canada's Air Administration forecasts passengers, cargo and aircraft movements on a national basis and for most of the commercially active airports.

AUTHORITY

Pursuant to the minister's responsibilities as set out in the Aeronautics Act.

OBJECTIVES

Primarily, to provide Transport Canada managers, air transportation facility planners and operational staff traffic forecasts to evaluate equipment and infrastructure requirements and to estimate revenue.

Secondarily, to offer the air industry, provincial governments and the general public an authorized source of aviation activity data.

BENEFICIARIES

The benefits are related to the availability of forecast data for policy and planning activity. The main beneficiaries are Air Administration officials who use the forecasts in planning infrastructure development and in estimating revenue.

EXPENDITURES (85/86)	**($000)**
CAP	19
O&M	1151 est.
Transfer	--
Total	1170 est.
Revenue	--
Net Cost	1170 est.
Person-years	18 est. (see Notes)

Notes: In the department's description of this program, 10 person-years were identified -- the forecasting division of the Statistics and Forecasts Branch of the Air Administration. In interviews with program officials, however, it became apparent that at least one full person-year in each of the six Air Administration Regional Offices is dedicated to this task, i.e. at least six additional person-years, plus some capability at major airports, e.g. Pearson International (Toronto). As well, they estimated that a portion (20 per cent) of the effort of the companion, six-person Statistics Division was supporting the forecast activity by assembling certain of the data used i.e. approximately one person-year. This gives an estimated total of 18 person-years.

The consequent cost figures have been extrapolated to estimate the 1985/86 resources consumed by all 18 person-years.

OBSERVATIONS

The main clients, Air Administration managers and planners, use the forecasts as input for determining and designing air way and airport system and facility requirements.

The resource level (est. 18 person-years, $1.2 million) appears high.

There has been no formal program evaluation to date, nor anything more than a cursory check on forecasting accuracy and possible steps to improve same. In addition, this unit is not required to work from a common departmental set of economic assumptions, although the department has an official set of assumptions.

The forecasts seem to be of no value to industry officials, as air carriers do their own, market-oriented forecasting and manufacturers have developed very sophisticated models to estimate demand for new aircraft. Industry also cited significant problems of objectivity (assumptions about policy impact) and timeliness. Nonetheless, industry representatives are open to the possibility of contributing to the process.

Provincial officials are not aware of the Air Administration's specific forecasting products and seem to have no need for these forecasts.

The allocation of responsibilities for macro-level forecasting (e.g. total activity at an airport) vs micro-level forecasting (e.g. peak-hour traffic at that airport) is becoming blurred, as central forecasting units become increasingly involved in micro-level projections traditionally done by other units.

Conversion of the airports activity into a separate entity as proposed in the departmental reorganization will reduce the need for, and scope of, the central forecasting unit.

Other modal administrations undoubtedly produce forecasts as well, although not to the same level of detail on a regular basis. Consistent with the intent of the proposed departmental reorganization to consolidate a number of functions in a single, coordinating group, the option of integrating the now separate forecasting capabilities should be pursued.

KEY ISSUES

Could cost effectiveness of the activity - consumption of resources vs benefit received - be improved by downsizing and more use of contracts with the private sector?

Given that neither industry nor provincial governments appear to derive any benefit from this activity, should whatever effort (even if small) that is being directed to external parties be discontinued?

Could improved coordination within the department, (i.e. the right split between units as well as assurance of a common base of forecasting inputs (i.e. economic assumptions) be achieved by a consolidated, multi-modal forecasting unit more cost effectively?

ASSESSMENT

In the view of the study team, there is a continuing requirement for a forecasting capability for the federal government, but the present allocation of resources appears excessive. The potential for consolidation with other modal forecasting units apparently has not been pursued. In addition, little use is made, on an ongoing basis, of the private sector.

There appears to be little scope for cost recovery. Of the few external clients for this service, the Canadian Aviation Safety Board is exempt from paying for Transport Canada services under the terms of its operating agreement with the department, while industry and the provinces would not pay for something they don't need. Any cost recovery would have to come from intra-departmental clients or, possibly, from setting fees for external participants at the occasional seminars on forecasting given by the department.

The study team believes Transport Canada should manage this program, but the private sector should be able to deliver the product and could probably do so at significantly less cost.

It appears that there is room for improvement in cost-effectiveness and for consolidation, and that the program should be downsized with private sector participation. It is estimated that a reduction of at least six person-years in the headquarters function with an overall saving of 30 per cent in expenditures could be achieved, taking into account the proposed privatization of the modelling function.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Reducing the Air Administration's centralized forecasting function by limiting direct aviation activity forecasting to forecasts of primary demand indicators.

2. Contracting with the private sector for the development of models for aviation activity forecasts.

3. Ensuring that all modal activity forecasting is based on a common set of economic assumptions, particularly when such forecasts are used to justify capital expenditures.

4. As part of the proposed reorganization of Transport Canada, vigorously pursue the option of privatizing macro-forecasting activities for all modes, retaining only a small, multi-modal managing unit to oversee the private sector work and to disseminate it to the modal administrations as appropriate.

CANADIAN COAST GUARD

OVERVIEW

This introduction covers Canadian Coast Guard (CCG) operations with the exception of marine safety regulation activities which are covered under safety regulation. These operations are concerned with the management of navigable waterways and the provision of services to shipping on those waterways, including search and rescue (SAR). Currently, some $700 million is spent annually on these programs, with aids to navigation constituting 64.5 per cent, icebreaking 17 per cent, ship movement systems and services 10 per cent, and SAR 8.5 per cent of program costs. Because 90 per cent of the expenditures are associated with duties involving the fleet, fleet costs, both capital and O&M, make up a very large percentage of the total cost. It will be noted that the overall level of cost recovery is extremely low.

There are two major issues common to these programs. First, there is very little revenue generated. Second, there are no effective mechanisms for controlling scope and cost. In turn, these have contributed to a lack of resolve to institute a system of cost recovery, because, in many instances, the extent of the benefit to a particular user is difficult to identify, as is the cost the user imposes on the system.

Given this situation, it would seem that specific proposals for cost curtailment and revenue generation should have been relatively easy to formulate. In fact, that has not been the case, partly because of the difficulty in making meaningful recommendations for real savings when the allocation of fleet costs among a number of programs is very subjective, and partly because data on performance indicators that would provide a more detailed understanding of how the costs are incurred and for what program are not available.

The costs associated with delivery of CCG programs are high. A basic issue is whether the current management of the federal government's civilian sea-going fleets is a cost-effective way to discharge federal responsibilities. The study team has noted that disparate fleets create the potential for inefficient use of resources. These fleet represent large capital investments which should be used as intensively as possible, and for an excess of resources under parallel management structures. The Team has further noted that the context in which federal resources are managed has changed since the question of fleet integration was last studied, and has concluded that a review of this matter is in order but confined to the civilian fleets, basically those of Transport Canada and Fisheries and Oceans.

More fundamentally, the CCG is currently trying to provide almost limitless services in the absence of either departmental policies or service charges to control program expenditures and without a well defined relationship between its missions and its budget. Consequently, the CCG's response seems constrained only by the availability of equipment and resources. Overall, the study team recommends to the Task Force that the government consider creating a public/private sector task force with knowledgeable industry participants to review the missions and tasking of the CCG to assist program and departmental managers to develop a program of specific initiatives for cost reduction and revenue generation. This task force could also be charged with reviewing the merits of civilian marine fleet integration under the CCG, and of the CCG's approach to formulating the operational requirements for vessels and vessel acquisition. In addition, the task force could review the policies and standards for the establishment and maintenance of marine aids to navigation.

With respect to the short term, the study team believes that it is necessary to attack both cost control and cost recovery simultaneously. This necessitates the CCG setting operational objectives consistent with its mandate and meeting them in a cost effective manner. From this perspective as well as for general accountability purposes, the study team supports the efforts of the CCG to allocate costs to specific program activities, e.g. marine aids to navigation, SAR, etc. and would be opposed to any suggestion that costs should be aggregated under an activity such as ship operations.

The study team further believes that a three pronged attack is necessary to contain costs: first, user charges should be instituted to control demand for services; second, the responsibilities of the CCG should be adjusted to ensure that the services it provides are related to transportation and appropriate to the federal government; third, the mechanisms for resource acquisition and program delivery should be modified to enable operations to be carried out more cost effectively.

There are two ways for the federal government to recover some of the costs associated with providing CCG services. These are direct user charges and revenue generation through imposition of a licensing fee; both avenues should be exploited in the view of the study team.

The initiation of user charges will have two salutary effects on the CCG's programs. In addition to enabling the federal government to recover from users some of the costs of the service provided by the federal government, it will provide an incentive to the user to limit requests for services to those which are essential. Consequently, it is the study team's view that the advantages to the federal government of instituting charges for specific CCG services (aids, dredging, icebreaking and vessel traffic services [VTS]) are sufficient to justify the effort that will be necessary for their implementation. In this respect, it is recognized that implementation of most of the user charges proposed will require passage of enabling legislation as outlined in the current draft bill for amending the Canada Shipping Act. Thus, high priority should be given to the passage of this legislation.

The complementary approach, where user fees are not practical or appropriate, is to institute a general levy. At present, the federal government permits but does not require small vessels to be licensed (which benefits the boat owner/operator through vessel identification for the better provision of emergency support services). This licensing service is free. Small vessels benefit significantly from CCG activities such as the provision of aids to navigation and SAR services. The study team is of the view that it is appropriate to defray some part of the overall costs of these services through the imposition of an annual fee for vessel licenses. In making this suggestion, the study team recognizes that there will be difficulties associated with collection and enforcement but believes that the introduction of a vessel licensing fee is feasible. At the same time, the government must be sensitive when imposing costs on a group which has enjoyed the services at no cost in the past, and a well conceived communications strategy is essential.

Proposals for adjustment of responsibilities take two forms: privatization and transfer of responsibility to other federal departments. With respect to the former, the study team has concluded that the responsibility for public correspondence services should be offered for privatization on either a regional or national basis. In many countries, this service is provided totally by industry, and there seems to be no compelling reason why this should not be so in Canada.

With respect to the latter, the study team has concluded that Transport is the most appropriate department for the CCG and that it should not become a military or para-military organization. At the same time, the study team has concluded that responsibility for facilities to protect shore property from erosion generated by shipping should be transferred to Public Works Canada (PWC). It is the team's view that PWC has the expertise as well as the federal mandate for program delivery of land-based structures, and thus is knowledgeable about mechanisms that could be used for beneficiary-related cost recovery of these expenditures.

The study team would be remiss if it did not mention at this point its concern about a program that was initiated during the study team's study period - the polar icebreaker. It is not the study team's intention to question the government's decision to construct this vessel, but the study team is very concerned about the proposed allocation of costs. It seems clear that the primary requirement for the vessel is sovereignty, and thus the first decision should be the selection of the program department, DND or Transport Canada. Even if the government has determined or does determine that the vessel should be operated by the CCG, the team believes that the costs of the polar icebreaker should not be borne by the Transportation Expenditures Envelope except to the extent that the operations of the icebreaker are in support of transportation.

With respect to the internal structure of the CCG, the study team has noted that, although there is no obvious duplication of functions, opportunities exist to reduce overhead by combining the responsibility for communications--based programs (operation of Coast Radio stations and VTS centres, together with their associated marine safety information programs). Moreover, this integration should be pursued regardless of whether the private sector assumes responsibility for public correspondence activities as outlined earlier.

The separation of the department's telecommunications activity into air and marine was done on the basis that no additional resources would be required over those which were needed for a combined operation. Despite the fact that the separation could not be achieved while respecting this caveat, the project proceeded. It is apparent that air and on-shore marine telecommunications and electronics maintenance staff should be combined wherever cost effective.

Opportunities seem to exist to use the contracting process in an expanded and more innovative way to reduce expenditures. This is particularly true of the aids to navigation system where more use of contractors under longer term contracts could encourage development of greater private industry capability, thereby servicing the aids system at lower cost. Additionally, contracting out those elements of the LORAN C system still operated by the government should be pursued. Finally, implementation of the findings of the Business Team would see more of transportation-related dredging contracted to private industry.

Taken collectively, these initiatives could be expected to lower the cost to the federal government of CCG programs while encouraging greater industry participation in the operation of the marine aids infrastructure. The CCG would be required to adopt a much more active and responsive approach to contracting out than it does at present.

In addition to these rather general observations, there are program-specific proposals for reducing CCG costs. For VTS, a framework for determining the need on a cost-beneficial basis has been developed which, if implemented, would not only reduce the size of the current program considerably but also provide for the system to remain responsive to changing requirements. With respect to icebreaking, the combination of the review of civil fleet integration and the proposed streamlining of the design, acquisition and manning processes, together with the effect of user charges on the demand for services, would provide some control of government costs. In the area of aids to navigation, the vessel-related measures noted under icebreaking in combination with increased and innovative contracting out and the restraining effects of user charges, appear to offer the best potential for cost reduction.

With respect to SAR services, cost containment seems most likely to be achieved by a modification of the resource allocation process, first to ensure that the government can identify the totality of resources devoted to this activity by DND and Transport, and second to place more emphasis on preventive measures (e.g. education), and the use of volunteer/private organizations.

The study team's themes are that the services provided by the CCG, with specific exceptions such as public correspondence, are essential and should continue to be provided under the aegis of Transport Canada; that some of the responsibilities should be transferred to other departments of the federal government; that the costs of the services being provided should be reduced significantly and the recovery in respect of those services should be increased substantially; that some adjustment in organization would contribute to reducing costs and increasing efficiency; and that in those cases where the level of service is inappropriate, mechanisms for their adjustment are required. The study team also sees opportunities for private sector involvement in the delivery of the program, e.g. operations and maintenance of LORAN C, where that is cost effective.

The study team's objective in proposing these changes is to reduce costs and increase revenues in the short term, and to rely on the findings of the proposed private/public sector task force for longer term recommendations that should focus on the CCG's missions, civil fleet integration, vessel design, vessel acquisition, vessel manning standards, policies and standards for the establishment and maintenance of marine aids to navigation, etc., and on appropriate cost recovery policies and long-term cost recovery objectives.

MARINE - SEARCH AND RESCUE

DESCRIPTION

The Canadian Coast Guard (CCG) maintains a search and rescue service to respond to distress calls originating in Canada's area of responsibility and to help prevent the loss of life.

AUTHORITY

The Canada Shipping Act.

OBJECTIVES

To provide search and rescue facilities and services to minimize marine fatalities and injuries, and to educate the boating public to promote safety and self-help.

BENEFICIARIES

Commercial and fishing vessel crews and owners, and pleasure boaters.

EXPENDITURES (85/86)	**($000)**
CAP	15,524
O&M	45,966
Transfer	900
Total	62,390
Revenue	-
Net Cost	62,390
Person-years	749

Note: does not include any expenditures of the Department of National Defence (DND) in support of Search and Rescue - Marine.

OBSERVATIONS

The Report on an Evaluation of Search and Rescue (Cross Report) published in September, 1982 contains a comprehensive examination of search and rescue (SAR) programs in Canada and makes recommendations for the organization and delivery of these programs. It is estimated that 75 per cent of the recommendations in the Cross Report have been implemented.

The operational arrangements work well with DND responsible for operating the Rescue Coordination Centres (RCC) with CCG assistance.

Senior program managers in Transport Canada (TC) are concerned about the mandate and resourcing of marine SAR generally. Double tasking of equipment and personnel as well as a contingency driven operational requirement make budget development difficult.

More than 8,800 marine SAR operations were recorded in 1984. Of these, over half were from operators of small pleasure craft and about a quarter were from commercial fishermen. These are typically low-cost operations as they tend to be of short duration and near shore as opposed to the higher cost operations on the ocean.

A new towing policy will be implemented in April 1986 under which CCG ships will tow vessels only when commercial services are not available and when delay would put lives or property into jeopardy.

No charges are made for CCG SAR services. Some managers feel that the institution of charges would make boaters reluctant to call for help when it is really needed, thus leading to either more critical emergency circumstances later or to tragedy. Others are concerned that the institution of a fee would be interpreted as an advertisement of the availability of a service leading to an increase in demand for service. Others suggest that fees will provide some level of cost recovery, as well as a disincentive to use the services except in cases of true emergency. The concept of insurance, similar to that offered by automobile clubs, was suggested as one means of defraying the costs to boat owners.

Prevention of SAR incidents will at least slow the rate of growth or perhaps reduce the costs of the program. Education of fishermen and other boat owners in proper seamanship and navigation would prevent some SAR incidents. Private organizations, such as Red Cross or Power Squadrons, could be given more funding to enable them to increase their efforts in this area.

The Canadian Marine Rescue Auxiliary already provides volunteer assistance in SAR, thus reducing its costs. Additional innovative ways of using volunteers, such as manning regular Coast Guard vessels, could be tried and evaluated.

There is insufficient interaction between the federal government's SAR program and the activities of provincial and municipal agencies, particularly police, in planning for SAR response.

KEY ISSUES

What program changes can be instituted to contain the costs of marine search and rescue?

ASSESSMENT

In the view of the study team marine search and rescue is a necessary activity in which the federal government has a legitimate role.

The assignment of responsibilities for SAR to TC in the marine mode and to DND in the air mode and in coordination of search activities causes some problems. It is not clear, however, that any other assignment of responsibilities would be superior or decrease the number or severity of the problems. Segregation of the SAR budgets in the two main departments would lead to a better understanding of the costs involved but operationally the program works.

Cost containment is the only feasible course of action. The study team believes increased emphasis on the use of education and training to prevent SAR incidents, increased use of volunteer and private organizations in the training and actual SAR program delivery, increased involvement in contingency planning by provincial and municipal agencies, and possibly, the development of automobile club-like emergency service delivery programs should all be explored as means of attaining this objective.

Rescue Coordination Centres can make better use of non-Coast Guard resources (e.g. municipal or provincial police forces). In addition, it might prove effective to utilize private helicopters and vessels in marine search if not in rescue. This may necessitate the federal government providing SAR kits for helicopters and ships, and entering into contracts on a contingency basis. Moreover, in reequipping Transport Canada's helicopter fleet, the department should consider the merits of taking into consideration SAR as a secondary mission for establishing the operational requirements of the aircraft.

A fine balance must be struck between the rates needed for commercial viability of private sector towing companies in areas of low volume and rates that would restrain boaters in real need from calling for help. Evaluation of the impact of the new CCG towing policy should be conducted to ensure this balance has not been adversely affected, especially since it seems likely the revenue from towing will be minor.

In the view of the study team, SAR can best be paid for through institution of a scaled license fee which would apply to pleasure craft as well as commercial vessels. Such a fee could recover part of the cost of aids to navigation and part of the cost of search and rescue.

New technology such as SARSAT should be utilized to the extent practicable, to reduce costs and increase the level of service.

OPTIONS

The study team recommends to the Task Foprce that the government consider the following:

1. Over the next two years, effect a 10-per-cent reduction in Marine Search and Rescue costs without compromising the program objective by emphasizing education and training to prevent SAR incidents, increasing involvement of volunteer and private organizations, increasing cooperation with the provinces and municipal agencies, and optimizing use of SARSAT.

2. On an experimental basis, provide suitable vessels to approved, responsible volunteer agencies.

3. Direct rescue coordination centres to make the best use of non-Coast Guard resources for marine search and rescue with a view to efficiency and cost-effectiveness.

4. Take steps to implement a contractual arrangement with private helicopter operators for assistance in marine search and rescue.

5. Develop and implement a scaled (according to size) license fee that should apply to all marine vessels, fishing and pleasure craft to, inter alia, recover part of the cost of search and rescue.

6. Consider the merits of including a secondary mission of search and rescue in specifying operational requirements when replacing the helicopter fleet.

MARINE - AIDS TO NAVIGATION

DESCRIPTION

Lake Ontario Water Levels: Control of water levels.

Marine Aids to Navigation: Visual, aural, and radio aids.

Radio Aids/Marine Navigation: Listing of coast station and hyperbolic navigation facilities.

Navigation Aids - Listing: Listing of all lighted aids and sound signals.

St. Lawrence Ice Control: Ice booms and artificial islands.

St. Lawrence Water Levels: Water depth forecasts.

St. Lawrence and Saguenay Rivers Navigation: To sound and dredge the navigation channel.

Waterways Development

Annex A contains individual program descriptions.

AUTHORITY

Canada Shipping Act; British North America Act; Terms of Union with Newfoundland; International Conventions.

OBJECTIVES

To develop, provide, maintain and ensure the efficient operation of aids to navigation, such as conventional aids, radio aids, ship channels and transportation in Canadian waters.

BENEFICIARIES

Shipping - safe navigation for commercial shipping, fishing vessels and recreational boating.

Shippers - more efficient shipping service.

EXPENDITURES (85/86)	**($000)**
CAP	187,308
O&M	182,297
Transfer	7
Total	369,612
Revenue	2,173
Net Cost	367,439
Person-years	3,095[1]

[1] Includes 100 person-years in the Aircraft Services Activity for helicopter operations in support of marine aids to navigation.

Notes: Because Canadian Coast Guard (CCG) vessels are constructed and tasked to carry out more than one activity (icebreaking, aids to navigation, search and rescue), the allocation of costs among these functions is approximate rather than precise. Findings in respect of reducing capital and O&M costs for all CCG vessels are made in the profile on Icebreaking.

Capital costs for fiscal year 1984/85 were unusually high, due to funds provided for ship construction under the Special Construction Recovery Program. The estimated 3-year average for aids to navigation capital costs over 1983/84 to 1985/86 is $185,128,000.

Program responsibility for all transportation-related dredging was transferred from Public Works Canada to Transport Canada in 1982. All ship channel dredging in Canada is therefore subsumed under St. Lawrence and Saguenay Rivers Navigation.

OBSERVATIONS

Depending on location, marine aids are provided for one or more segments of the user community (commercial, fishing, recreational). Certain aids are associated with access to ports, while others are enroute aids associated with the way.

The largest cost factor in providing these aids is associated with fleet operations. By contrast, only approximately $425,000 was budgeted in 1984/85 for research and development of marine aids.

Where aids serve a single user, they are provided and maintained by that user or the federal government is compensated for so doing. TC does not now have the legal authority to charge for common user aids.

Contractors service marine aids in many remote areas and away from main channels. Private entrepreneurs currently do not have the equipment or expertise to place and maintain major floating aids on station to required standards.

Contractors operate and maintain the LORAN C Station at Williams Lake, B.C.

Fisheries and Oceans Canada has responsibility for supporting development of marinas, which in turn impacts on the need for dredging and aids.

Included in the dredging programs are funds for erection of shore protection facilities for those whose shore property would otherwise be eroded as a result of shipping wakes. Funding decisions are made based on advice from Public Works Canada.

KEY ISSUES

Should common user aids be subject to user charges?

Are federal government processes for determining the requirement for and costs of aids sufficiently stringent?

Should current contracting out practices be extended, and, if so, how?

ASSESSMENT

The provision of aids to navigation is necessary for vessel safety and, in the case of commercial shipping, to improve operating efficiency. The departmental assignment of this responsibility for aids is correct. Responsibility for provision of shore protection facilities, however, should be transferred to Public Works Canada the study team believes.

Although a cyclical review of the aids requirement is carried out, the framework for control of the program costs is inadequate. In particular, attention should be focussed on:

a. The effect that charging for aids would have on the demand for the service and thus the cost of the program;

b. Cost reductions that appear achievable through additional employment of contracting out. This specifically involves exploring the cost effectiveness of contracting out the provision and maintenance of all pleasure craft aids; contracting out operation of all LORAN C systems; and setting longer term contracts for floating aids provision and maintenance to enable entrepreneurs to acquire the necessary capital equipment and expertise to fulfill aid provision and maintenance (e.g. buoy scraping and painting maintenance of automated lightstations);

c. Ensuring the Fisheries and Oceans Canada program of support for small craft harbours and marinas takes account of the implications for the provision of aids and dredging in its decision making;

d. Technology opportunities for reducing program costs including remotely operated marine radio stations.

The Study Team on Services and Subsidies to Business include immediate findings of the implementation of aspects of the Government of Canada's Dredging Policy report dealing with jurisdiction, user fees, levels of service and private sector involvement as a more cost effective approach to federal dredging responsibilities.

Savings could be effected by consolidating the radio aids/navigation program with other programs involving the provision of marine safety information and by combining marine and air telecommunications and electronics personnel.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Phasing in, between 1986/87 and 1990/91, a 25 per cent reduction in the net cost of the aids to navigation program through a combination of expenditure reduction and user charges, in consultation with affected users. To this end, develop specific cost recovery targets and implementation options for discussion with users.

2. Charging Fisheries and Oceans Canada for all navigation aids and dredging in support of marinas and small craft harbours.

3. Charging ports for all terminal marine aids to navigation.

4. Contracting out the operation and maintenance of all LORAN C facilities and should begin to contract out maintenance of other aids to navigation, particularly shorebased aids, shorebased aspects of floating aids, and provision of aids in remote areas and solely for the pleasure boating community, where the approach is demonstrated to be cost effective.

5. Providing all information on marine aids to navigation from a single source.

6. Combining shore-based marine electronic aids maintenance personnel with air telecommunications maintenance personnel where cost effective.

7. Marine use of new technology in reducing its O&M costs for radio aids to marine navigation.

8. Transferring to Public Works Canada responsibility for shore protection facilities.

9. Developing and implementing a scaled (according to size) licence fee that would apply to all marine vessels, fishing and pleasure craft to, among other things, recover part of the cost of aids to navigation.

10. Consequent on appropriate amendments to the Canada Shipping Act, adopting and implementing a policy of user charges for all aids to navigation and dredging.

PROGRAM DESCRIPTIONS

MARINE AIDS TO NAVIGATION

Lake Ontario Water Levels: On behalf of the International Joint Commission, the Coast Guard's Aids and Waterways Directorate is responsible for the control of water levels and outflows of Lake Ontario to benefit riparian, navigation, and electric power companies on the lake and the downstream portion of the St. Lawrence River.

Resources are subsumed under Waterways Development.

Marine Aids to Navigation: The Coast Guard is responsible for visual, aural, and radio aids for marine navigation.

PYs = 2,808
TRANSFERS = $57,000
CAP = $273,044,000
O&M = $151,311,000
REV = $ 2,164,000

Radio Aids/Marine Navigation: The Coast Guard maintains for use by mariners a detailed listing of the characteristics, geographical location, and service procedures of coast stations, and hyperbolic navigation facilities operated in Canada.

O&M = $33,000

Navigation Aids - Listing: The Coast Guard maintains a detailed list of characteristics and the geographical position of all lighted aids and sound signals in Canada.

PYs = 33
O&M = $1,615,000

Note: Also includes Notices to Shipping and Notices to Mariners.

St. Lawrence Ice Control: The Coast Guard maintains ice booms and artificial islands in the St. Lawrence shipping lanes to control ice, alleviate flooding, and assist in winter navigation.

Resources are subsumed under Waterways Development.

St. Lawrence Water Levels: Water depth forecasts are available for commercial shipping in the St. Lawrence River at and downstream from Montréal.

Resources are subsumed under Waterways Development.

St. Lawrence and Saguenay Rivers Navigation: To improve and maintain the navigation channel in the St. Lawrence and Saguenay rivers, the Coast Guard Aids and Waterways Directorate sounds and dredges the rivers to specific depths.

Resources are subsumed under Waterways Development.

Waterways Development: See Lake Ontario/Water Levels, St. Lawrence/Ice Control, St. Lawrence River Water Levels, St. Lawrence Saguenay Rivers/Navigation.

PYs = 181

CAP = $ 5,066,000
O&M = $19,453,000

ICEBREAKING

DESCRIPTION

The Coast Guard provides ice information and icebreaking services to commercial shipping in Canadian waters.

AUTHORITY

Implicit authority exists in the Canada Shipping Act and Arctic Waters Pollution Prevention Act.

Explicit authority is contained in an Crder-in-Council dated 26 July 1930.

OBJECTIVES

To develop, maintain and ensure the efficient utilization of icebreakers, helicopters and other facilities and services to facilitate the safe and expeditious movement of marine traffic through ice-covered waters; to prevent flooding caused by ice jams on the St. Lawrence River and other areas as required; and to support specific non-Coast-Guard activities.

BENEFICIARIES

Shipping and fishing industries; shippers; and riparian interests along the St. Lawrence River.

EXPENDITURES (85/86)	**($000)**
CAP	71,765
O&M	98,112
Transfer	-
Total	169,877
Revenue	6,770
Net Cost	163,107
% of Cost Recovery	4
Person-years	1,201[1]

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[1] Includes 26 person-years in the Aircraft Services Activity for helicopter operations in support of icebreaking.

Notes: Because Canadian Coast Guard (CCG) vessels are constructed and tasked to carry out more than one activity (icebreaking, aids to navigation, search and rescue), the allocation of costs among these functions is not precise.

The O&M costs for icebreaking vary significantly from year to year according to the severity of ice conditions and there is a consequent impact on fuel and other operating costs.

This profile addresses issues common to operation of the Canadian Coast Guard fleet.

OBSERVATIONS

Icebreaking is provided in support of commercial shipping in ice-covered waters on the St. Lawrence from Montreal east and in the Gulf of St. Lawrence and the Cabot Strait. Icebreakers assist commercial shipping in the Great Lakes in the spring and during winter freeze-up prior to Seaway closure. Icebreaking also supports commercial vessels in the resupply of northern communities and other federal maritime activities in the Arctic during the summer. Icebreakers open harbours in the spring and when the need arises in winter.

Winter icebreaking, although begun to alleviate flooding in the St. Lawrence, has grown to provide commercial shipping with access to Gulf and River ports as well as ice-infested Newfoundland ports which would otherwise be closed by ice for several months.

A number of factors taken together significantly increase the cost of providing icebreaking services in Canada: the existence of separate government fleets; the multi-mission tasking of many CCG vessels (icebreaking, aids, search and rescue); crew levels and habitability standards; design requirements; the management of the acquisition and refit process (including quality assurance activity); and the requirement to have government vessels built in Canada.

Icebreaking resources on the Great Lakes are perceived as inadequate to cope with season opening and closing conditions, which is when the greatest need exists.

Icebreaking on the St. Lawrence and Saguenay Rivers protects properties along the shore. The certainty of the protection has encouraged land improvements in what were previously flood plains. This activity together with icebreaking to assist shipping constitutes a de facto subsidy to riparian land holders, and to ports in this area to the competitive disadvantage of ice-free ports on the Atlantic Seaboard. For example, Transport Canada (TC) estimates between 40 per cent and 50 per cent of icebreaking activity along the St. Lawrence and Saguenay is associated with flood control.

KEY ISSUES

Does the icebreaking program of TC distort competition among Canadian ports on a regional basis?

Is the level and allocation of icebreaking resources appropriate to meet industry requirements?

How could icebreaking costs be reduced per unit of output?

What approach should be adopted to introduce user charges for icebreaking?

ASSESSMENT

In the view of the study team, due to the build-up of infrastructure in riparian areas along the St. Lawrence River subsequent to the inception of flood control icebreaking, its discontinuation appears impractical. Given the need for flood control activity, and the development of port and shipping infrastructure on the St. Lawrence predicated on year-round navigation, it is appropriate to continue to maintain the river open to Montreal. It is, however, reasonable to institute user charges for the portion of this activity in support of flood control and in support of commercial shipping, consistent with the benefits that accrue to riparian land holders, and with the maintenance of a viable shipping industry and the need to avoid cargo diversion to U.S. ports.

The existence of separate fleets run by a number of federal civilian departments, principally Transport Canada and Fisheries and Oceans, increases overhead costs and impedes optimum utilization of a very large capital investment. The government has studied the issue of fleet integration on a number of occasions, the latest in 1976.

The study team is advised that this review included consideration of how seagoing resources should be managed in support of Canadian Arctic sovereignty. For a variety of reasons, it was decided at that time to leave the separate federal fleets intact. But, it is the study team's view that it is now timely to reconsider this issue insofar as the merits of integrating the civilian marine fleets is concerned.

The cost of individual CCG vessels could be reduced by building single-mission ships. This would, however, increase overall fleet costs due to the need to build more ships to carry out the total range of missions. On the other hand, multi-mission vessels required to stay at sea for extended periods will continue to cost more to design and construct than purpose-built vessels. This then becomes a question of trade-offs that should be considered when the fleet integration issue is revisited.

In the study team's opinion, an independent review is required of whether the CCG's approach to vessel design and construction takes full advantage of cost savings achievable through modern technology, and through utilization of the design capabilities of shipyards.

Federal management of the overall vessel acquisition and refit process is cost-inefficient. The requirements to build government vessels in Canada and the associated tendering process are designed to distribute work among Canadian shipyards rather than build government vessels at the lowest cost. Any policy to charge for icebreaking services should not seek to recover that portion resulting from higher costs associated with building vessels in Canada. More generally, any such additional costs should be funded, the study team believes, by the Department of Regional Industrial Expansion.

Total crewing costs for CCG vessels are high. A current study of options for reducing crewing levels together with the gradual introduction of more cost-effective crewing policies should, over time, reduce fleet costs. However, further economies could be achieved through greater cross-training and cross-utilization of specialized personnel. This probably will require changes to collective agreements.

Recent augmentation of icebreaking capability in the Great Lakes should enable federal icebreaking capability to adequately meet the requirements of the current environment in all but the most extreme circumstances. To acquire capability to meet extreme circumstances would significantly add to the cost of the icebreaking program, and does not appear to be justified.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Where icebreaking is provided for non-transportation purposes, charge the appropriate department or the beneficiary (in the case of flood control, for example).

2. Review the integration of the federal government's civilian marine fleets to determine if current circumstances warrant some or total integration. This review should also consider the merits of single-mission vs multi-mission vessels.

3. Consider replacing Transport Canada's current approach to vessel acquisition by using operational performance specifications so as to produce lower cost vessels and reduce fleet costs.

4. Implement the results of the current review of vessel manning standards as well as the evaluation of productivity gains achievable through cross-training and cross-utilization as quickly as possible to reduce Canadian Coast Guard costs.

5. An assessment should be made of the policy of requiring federal vessels to be built in Canada to determine how much and which department should pay for any "built-in-Canada" premium.

6. Consequent on appropriate amendments to the Canada Shipping Act, adopt user charges for icebreaking in support of marine transportation.

SHIP MOVEMENT SYSTEMS AND SERVICES

DESCRIPTION

The provision of marine safety, distress and public correspondence communication service in Canadian waters and other areas of Canadian responsibility.

The provision of vessel traffic services (VTS) in selected Canadian waters.

The provision of marine safety information (Notices to Shipping/Notices to Mariners) in all Canadian waters.

AUTHORITY

Canada Shipping Act; international conventions and resolutions.

OBJECTIVES

To develop, provide, maintain and ensure the efficient operation of vessel traffic services facilities, a network of coastal radio stations, and other communications and information systems to facilitate the safe and expeditious movement of marine traffic in Canadian and adjacent waters.

BENEFICIARIES

Commercial shipping, pleasure boaters, fishing industry, tourism, general public.

EXPENDITURES (85/86)	**($000)**
CAP	17,363
O&M	56,792
Transfer	-
Total	74,155
Revenue	2,400
Net Cost	71,755
% Cost Recovery	3
Person-years	944*

* Includes three person-years in the Aircraft Services Activity for helicopter operations in support of VTS.

Note: Person-years and O&M costs are subject to downward revision to reflect departmental reductions in Vessel Traffic Services.

OBSERVATIONS

Transport Canada (TC) public correspondence services are in competition with similar services offered by the British Columbia Telephone System on the west coast.

The current level of charges for public correspondence services is low. Rates for commercially provided services are regulated by the Canadian Radio-Television and Telecommunications Commission (CRTC) in British Columbia, and elsewhere by the various provincial utility boards.

Revenue from public correspondence is generated largely through one major station in each area. Small stations, while necessary to provide distress and safety coverage, obtain minimal revenues only.

Public correspondence is currently labour-intensive, thus decreasing the attractiveness to industry of offering such a service. Introduction of new technology would decrease operating costs but increase boater costs.

Congestion on the calling and distress VHF frequency (channel 16) as a result of improper usage by the pleasure boating community is not being effectively controlled by the federal government, to the detriment of safety.

The extent of VTS coverage in Canada is too large relative to the levels of traffic and associated risks. A TC study of VTS in Canada estimates that, on a cost beneficial basis, VTS should be considerably less than the current program. Additionally, the equipment is overly sophisticated. At the same time, TC has completed a study demonstrating that there are considerable savings in person-years and dollars associated with increased automation of VTS activities.

If TC charges for VTS, those bearing the cost (either industry or the port) would want to have a greater say in the location and quantity of VTS services offered.

There appears to be some duplication in the separate management structures that have been set up for both communications and VTS activities.

In the view of the study team, the provision of marine safety information is a necessary activity. The responsibility for provision of this information should be consolidated.

KEY ISSUES

How could public correspondence services be most cost-effectively privatized?

Could safety communications services be delivered more cost effectively?

Could the amount of VTS in Canada be cost-effectively reduced, and how can future expenditures be effectively controlled?

Could marine safety information be provided more cost-effectively?

ASSESSMENT

In the view of the study team, federal rates for public correspondence are too low and should be increased. Higher rates would improve the attractiveness of the public correspondence function to private enterprise as a business venture. Significant cost savings to the federal government appear feasible only if the total service (i.e. VHF, MF and HF) is turned over to some other agency or agencies. Such divestiture could be economically effected on a regional basis where an agency was interested in providing the service (e.g. B.C. Telephone on the west coast). However, such changes would likely have to encompass a total region because revenue tends to be generated by the larger stations in any area. The study team believes the government should pursue this approach on a regional basis across Canada, acknowledging low traffic densities and technology considerations may preclude private sector interest in some areas unless government assistance were available.

Safety problems caused by unwarranted use of the VHF safety and distress channel can be addressed through more effective enforcement of usage regulations. A separate mechanism for first-line enforcement is not required as the capacity already exists in Canadian Coast Guard (CCG) radio stations.

Transport Canada has held down the cost of communications facilities by the consolidation of some small CCG radio stations into fewer but larger stations. There is a practical limit to such consolidation, but it has not been reached nationally. In addition, TC should seek to operate some of the remaining stations remotely from hub stations.

Government and public perceptions that there is too much VTS in Canada coincide. The Regulatory Team concluded that proposed amendments to the Canada Shipping Act, which provide authority for a national VTS program, should be put on hold pending an independent cost-benefit assessment, with appropriate user consultation. The study team has concluded that the TC "National VTS Study", which has involved extensive user consultation and which has been favourably reviewed by independent groups, provides a mechanism for determining the present and future cost-beneficial requirement for VTS, and should be used as the essential control mechanism on the VTS program. (Values associated with perception of risk should not be included in the calculation of cost-benefit ratios.) Use of this study should enable an immediate start on reductions in VTS O&M costs that eventually should reach at least 30 per cent.

Transport Canada's studies on a "Data Acquisition and Display System" for VTS offer increased program efficiencies through automation of VTS as well as provision of marine safety information, and should be implemented if shown to be cost effective.

User fees should be adopted for VTS consistent with principles applied to other way services.

Excessive costs appear to be incurred through separate management and operation of communications service and VTS, although there appears to be minimal duplication of function. Economies could be achieved by the integration of management and the cross-training of personnel.

The study team believes marine safety information is being provided at the appropriate level. However, the provision of information on Radio Aids to Marine Navigation should be consolidated within the responsibility centre for other marine safety information.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Increase the rates for radio public correspondence services to cover the cost of providing that service.

2. Offer for privatization Transport Canada's radio public correspondence service, on a national or regional basis.

3. Reduce the number of Canadian Coast Guard radio stations to the minimum required to provide an effective safety communications service by consolidating stations and by operating as many of the remaining stations as feasible remotely from a hub station.

4. Investigate methods of controlling the congestion and improper use of the VHF safety and distress channel.

5. Reduce the size of the VTS program by adopting the framework outlined in the "National VTS Study". Recommendations on "Data Acquisition and Display Systems" which would further control the life cycle cost of the program and associated equipment, should be implemented if demonstrated to be cost-effective.

6. Consolidate the management of VTS and communications services and provide cross-training of personnel where cost-effective.

7. Combine its marine and air telecommunications maintenance personnel where cost-effective.

8. Consolidate responsibility for provision of all marine safety information services in one organization.

9. Consequent on appropriate amendments to the Canada Shipping Act, charge for VTS.

PORTS

OVERVIEW

The principal role of the federal government in the operation of ports is to ensure that the system meets the broad needs of users in terms of accessibility and capacity, and to see that certain key ports are operated having regard for the national interest. Thus the key issue is the extent to which the federal government needs to continue to be involved in the management and financing of Canadian ports for the attainment of these objectives. In recognition of their geographic and regional distribution, and of their relative importance to the Canadian economy, the level of federal government involvement in the management and financing of Canadian harbours and ports ranges widely.

Canada Ports Corporation (CPC) was created in 1982 as a Crown corporation responsible for the operation of 15 ports. Five are wholly-owned subsidiaries designated as Local Port Corporations (LPCs), and the others are classed as divisions. The stated intention is to provide LPCs with a high degree of autonomy for the management and operation of the ports for which they were established. The corporation operates on a self-sufficient basis, as do its constituent ports (with two exceptions).

Harbour Commissions are ports operated with a high degree of local autonomy on an individually self-sufficient basis. There are nine Harbour Commissions; five in Ontario and four in British Columbia. They obtain their financing through public or private sources. Surplus profits are transferred annually to the federal treasury, with the exception of Toronto and Hamilton, Ontario for which surpluses are transferred to their respective municipalities.

There are 301 Public Harbours and Ports which are managed and financially supported by Transport Canada. The current fee structure recovers 27 per cent of O&M costs ($10.2 million out of a total of $38.0 million). There is an additional expenditure of $31.8 million for capital requirements. Local management of these facilities is largely carried out by ministerially appointed fees-of-office Wharfingers and Harbour Masters.

Some ports are of considerable economic importance to adjacent and inland areas of the country. For example, the

Province of Alberta and prairie grain companies have put considerable funds into the Ridley Island development at the Port of Prince Rupert, and have worked closely with the Port of Vancouver to ensure that provincial shippers' needs are met.

There is one additional concern related to the national interest that should be mentioned and this involves the potential of competition from U.S. ports adversely affecting the utilization of Canadian ports. The study team believes that the solution is to recognize this potential and to develop appropriate marketing and port development strategies. Unfortunately, it is not obvious that the situation is recognized or that the incentives exist to address it.

The basic theme of the study team's assessment is the desirability of major ports (including the Harbour Commissions and most of the CPC ports) being self-financing and locally managed on a commercial basis, to ensure accountability and responsiveness, with sufficient safeguards to protect the national interest and minimal reliance, if any, on the federal treasury. In adopting this theme as the ultimate objective, a concern emerged that many of the present CPC ports may not be able to individually generate sufficient development capital from private sector sources for their needs in the short term. Accordingly, the study team considered means of guaranteeing or assisting in the raising of such funds over the next few years so that a successful "track record" could be established, thereby making it possible for the ports to become individually self-sufficient as Harbour Commissions or private ports. In essence, the study team's proposal involves stripping the management responsibility from the CPC and leaving that corporation as a holding company. The responsibility for management would then be given to the LPCs.

For smaller and remote ports, the main theme is to ensure that they are managed as cost effectively as possible by the most appropriate body. Where they are not single user facilities, and where they are not and cannot be made financially self-sufficient but their continuation is necessary, this will involve direct subsidization by the federal government.

PORTS

DESCRIPTION

Canada Ports Corporation: The Canada Ports Corporation has system-wide responsibilities with regard to the national port system, and managerial and operational responsibilities with regard to the ports under its jurisdiction. These ports (known as non-corporate ports) are: St. John's, Saint John, Belledune, Sept-Iles, Chicoutimi, Baie des Ha! Ha!, Trois-Rivières, Prescott, Port Colborne, and Churchill. Local Port Corporations have managerial and operational responsibilities for ports at which they are established: Halifax, Québec, Montréal, Vancouver and Prince Rupert.

TRANS.PYMT = $32,219,000

Financial Assistance for Harbour Improvements: The Harbours and Ports Directorate provides assistance to the nine Harbour Commissions (Port Alberni, Nanaimo, North Fraser, Fraser River, Lakehead, Hamilton, Toronto, Oshawa and Windsor).

TRANS.PYMT = $2,130,000

Public Port Facilities: The Harbours and Ports Directorate is responsible for public facilities at approximately 389 locations for berthing and servicing of vessels and handling of cargos, to support commercial marine transportation.

PYs = 93
REV = $6,665,000
CAP = $32,662,000
O&M = $36,571,000

AUTHORITY

Canada Ports Corporation Act, 1982; Harbour Commissions Act, 1964; Toronto Harbour Commission Act, 1911; Hamilton Harbour Commission Act, 1912; Public Harbours and Port Facilities Act; Canada Shipping Act.

The BNA Act (Constitution Act) designates international trade and interprovincial and international transportation and shipping as federal responsibilities. Navigation is also a federal responsibility as is the sea-bed in many harbours. There are no statutory requirements for the federal government to own ports.

OBJECTIVES

Canada Ports Corporation (CPC) - The provision of an efficient port system to facilitate Canada's international trade and to support national, regional and local economic and social needs.

Harbour Commissions (HC) - As for CPC and further to provide a high degree of autonomy for the management and operation of the ports while contributing to the integrity and efficiency of the ports system.

Public Harbours and Ports (PHP) - To develop, administer and maintain designated harbours and port facilities, in order to meet commercial shipping needs and to support a safe and efficient national marine transportation system.

BENEFICIARIES

The ports support Canadian international and domestic trade and national, regional and local economic and social needs.

Beneficiaries are Canadian and foreign exporters/importers of goods and commodities, shipping companies, Canadian transport Companies, the marine trade, port communities, ships' passengers, and the national business community.

EXPENDITURES ($000)

	Public Harbours and Ports (85/86)	**CPC (84)**
CAP	31,800	95,600[1]
O&M	38,000	169,300
Transfer	23,200[2]	-
Total	93,000	190,300[3]
Revenue	10,200	213,700
Net Cost (Profit)	82,800	(23,400)[3]
% Cost Recovery	12	112
Person-years	93	1,520

[1] This amount represents the total capital expenditures of CPC for 1984 and is shown for information purposes only. It is not included in the "Total Cost" figure for CPC.

CPC employed 118 people at headquarters and some 1,400 at the various ports in 1984. (The number of headquarters staff was reduced to 82 in early 1985). The CPC expenditures cannot be added to the Public Harbours and Ports Dimensions as they are not on the same financial basis.

2 This amount includes $18.7 million as a grant paid to CPC for special recovery construction projects, as well as $2 million for grants to the nine Harbour Commissions.

3 This amount includes $21 million for depreciation, and represents CPC's total operating costs for 1984.

Notes: CPC property has a replacement value of over $1 billion and annual revenue of $226 million. The net book value of the Harbour Commissions is $162 million (1983) with revenues of $35.6 million. The replacement value of the Public Harbours and Ports is estimated to be over $1 billion with revenues of $6 million to $9 million.

In 1980, the federal government decided that CPC no longer had to pay interest on its accumulated debt of $318 million (frozen debt), pending the enactment and implementation of the Ports Canada legislation. Subsequently, the Treasury Board has asked CPC to pay $133 million ($83 million in June 1985, and $50 million in June 1986) out of its current long and short term investments (surplus) of some $280 million. The first payment has been delayed at the request of the Minister of Transport pending some further discussion on the matter.

OBSERVATIONS

There are some 300 ports in the PHP program, most of which do not recover their costs.

The HCs, five in Ontario and four in British Columbia, are all largely self-supporting, although they do not pay municipal taxes or grants in lieu thereof.

HCs have a high degree of autonomy for the management and operation of their ports. They may obtain financing through the federal government or private sources, although with the exception of Toronto they have all used federal funding. All funds in excess of operational and capital requirements of each HC theoretically are transferred annually to the federal treasury except in the case of Toronto and Hamilton, for which surplus operating funds are transferred to the municipality.

CPC is a Schedule C-2 Corporation responsible for five subsidiary corporations (LPCs) and 10 division ports.

CPC headquarters exercises control over the constituent ports, e.g. it requires the submission of the LPCs business plans. Indeed, some observers claim little has changed with the passage of the Canada Ports Corporation Act in 1982. It is a generally held view that the LPCs pay a high assessment to CPC headquarters for the services provided.

The current practice of leasing out facilities to terminal operators is very efficient (long term leases are required if major capital investments are to be made by the operators), but the procedures for finalizing long term leases by Crown corporations are cumbersome and slow.

The role of the port is to facilitate trade and in particular to assist in making Canada's exports competitive in foreign markets. This concept is sometimes in conflict with the "return on investment" criterion.

Privatization of the British ports was conducted in two stages but all ports in the U.K. are now in private hands. Competition has not resulted in duplication of facilities and investments are made on the basis of market demand and flexibility.

A track record has been established by the HCs. It is the opinion of Treasury Board consultants that if steps were to be taken to privatize CPC ports, it should not be for 3 years so as to allow the ports sufficient time to establish a track record of their own.

KEY ISSUES

Does Canada need a national ports system/policy?

Could economies be realized if all ports were under a single authority?

Could efficiency gains be expected by creating additional Harbour Commissions or privatizing ports?

Should any ports 'system' be required to finance ports performing imposed public duties, i.e. finance non-viable ports through cross-subsidization?

Is the public interest served by permitting ports to compete?

ASSESSMENT

In the view of the study team, the federal government's role in the national ports system should be to oversee and encourage orderly development of ports in the national economic interest. This can be achieved by retaining a small unit of policy/finance personnel in Ottawa to advise the minister and administer any capital and/or operating subsidy transfers, and to administer the PHP program.

The federal government's ultimate goal with respect to the main groups of ports should be divestiture and/or return on investment. Where federal government assets are transferred to a new port entity, a dividend policy should be established. Any assets sold should realize market value. With respect to the frozen debt, the study team favours conversion to equity rather than a repayment schedule.

Local port management would result in less government involvement and greater efficiency and responsiveness.

Since ports are not interconnected, they need not be treated on a system basis. Moreover, the port authority need not be an operator of facilities but could expand its leasing of facilities to become more and more a landlord.

Direct cross-subsidization of non self-sufficient ports by those that are earning a profit tends to diminish any managerial incentive to achieve efficiency. Individual ports within a system should be self-sufficient. The system should be managed such that each port or group of ports, outside of those in the PHP program, would either be self-financing or acquire capital in the private market. There should be no federal government guarantees in the view of the study team.

Where a non-viable port is required to operate in the "public interest", the federal government should provide clearly identifiable financial assistance. Thus, where port facilities are built for reasons of economic development and/or to serve a socio-economic need, such infrastructure should only be put in place if the government directing the investment pays the cost associated with the projects. Churchill is a good example of government intervention resulting in non-productive capital investment. The port of Churchill is not now economically viable and probably never will be; it should be removed from the CPC, and, if it is to continue, its losses covered by appropriations.

The study team believes the federal government's relationship with the HCs should be as distant as possible and confined to the appointment of some commissioners from the ranks of the best qualified people available; to ensuring that the HCs perform in a responsive commercial manner taking into account any regional or national responsibility; and to preventing abuse of port monopoly power.

Fewer Transport Canada resources for PHPs would be required if fishing and boating facilities were transferred to the Department of Fisheries and Oceans, and if single user facilities were transferred to the user.

Any improvements which may be required to facilitate transfer of port facilities either to provinces or to the private sector should be limited in scope.

Cost recovery at the remaining PHPs can be increased to cover a larger share of capital and operating costs. This can be accomplished both by increasing fees, rates, etc. and by introducing further efficiencies such as calling tenders for contracted port management.

Viable or potentially viable public ports could become autonomous HCs, or could be joined with other ports in an association.

The study team believes that competition between ports should be encouraged where it contributes to the achievement of system efficiency. In this respect, intensive and innovative marketing strategies are important to ensure continued utilization of Canadian ports by Canadian shippers.

The federal government should be careful not to create (and remove where possible) distortions which may affect the viability of certain ports (ice breaking, dredging, and rail freight subsidies).

The ports compete more for capital than for traffic. The high front end costs associated with port infrastructure and the single purpose of the facilities within a port make it difficult for all but those ports with land holdings in the downtown to obtain private financing. Such financing would be more readily available to a parent corporation having a number of ports within its purview. This represents a key difference from the assessment of the Study Team on Real Property Management which proposed divestiture of ports on an individually self-sufficient basis.

The study team was not able to achieve absolute consensus on the following options with one member concluding that federal government involvement in a holding corporation for the major ports is not necessary.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. For the major ports, private capital markets should be the source of investment funds and Transport Canada should see that these ports are operated such that, except in the case of imposed public duty or where the federal government determines that an uneconomic port must continue in operation, no federal government funds are provided to any port or Harbour Commission.

2. Negotiate transfer of the responsibility for Public Harbours and Ports whose function is primarily to support fishing operations to the Department of Fisheries and Oceans.

3. Take action to divest itself of as many of the remaining single user Public Harbours and Ports as possible to the users: provinces, private interests or CN Marine.

4. Determine whether the remaining Public Harbours and Ports are necessary, and where they are, operate them as cost effectively as possible making use, for example, of benefit/cost analyses in the determination of the justification for capital expenditures; and where they are not, divest or close them.

5. The frozen debt of the Canada Ports Corporation should be reduced by the amount of surplus withdrawn by the Treasury Board, and the balance of debt shown on the books as equity.

6. The Canada Ports Corporation should pay a dividend, and whenever federal assets are transferred to ports, a dividend policy should be established, unless assets are sold at market value.

7. Give viable or potentially viable Public Harbours and Ports, such as Victoria, the opportunity to become a Harbour Commission or to join the Canada Ports Corporation.

8. Introduce legislative changes to convert the Canada Ports Corporation to a holding corporation (Canadian Associated Ports - CAP), the purpose of which would be to function as banker and guarantor of private capital funding. There should be a parent-subsidiary relationship between this holding corporation and local ports.

   Port membership in the Canadian Associated Ports would be voluntary and corporation ports not wishing to participate should be permitted to opt out, and become Harbour Commissions or private ports.

9. Over the next three to five years, determine if a more cost-effective system would result from privatization of ports, either individually as they become mature, or as a system.

RAIL PASSENGER SERVICES

OVERVIEW

All rail passenger service in Canada is highly uneconomical. In 1984, for example, VIA Rail services received operating subsidies of $475 million in relation to revenues of $168 million. Current year subsidies are $600 million including some allowance for capital and the reinstitution of previously cancelled services. Rail passenger service also carries the smallest proportion of all public transport passenger-kilometre (6 per cent).

Despite these facts, successive governments have supported the provision of uneconomic rail passenger service on grounds of social objectives and national unity in response to perceived public preferences. It would appear, however, that confidentiality and the lack of public information about the real costs of rail passenger service have perpetuated uninformed opinion and inhibited rational policy development. For example, recent surveys show that, when presented with factual information on costs and revenues, a significant proportion of the public favour elimination of the large subsidies now paid for this mode of transportation.

Since 1967, the federal government has subsidized losses on intercity rail passenger services, first at a statutory level of 80 per cent under Section 261 of the Railway Act and subsequently, at a level of 100 per cent through the establishment of VIA Rail Canada. Although a small number of statutory CTC subsidies (about $10 million) continue to be paid directly to the railways, there is no real justification for differentiating between those services subsidized by the CTC, and those services offered by VIA Rail. Indeed, through the establishment of VIA Rail, the federal government has clearly stated its intent to relieve the railways of the costs of passenger service.

Rail passenger services can be grouped into four major categories that involve distinctly different operating environments and markets:

a. transcontinental services that contribute to national unity and promote tourism;

b. corridor services that operate in highly competitive markets where a wide variety of air and bus alternatives exist;

c. regional services where there is relatively less competition from other modes; and

d. remote services where travel alternatives are severely limited.

The key rail passenger issue is whether the social and secondary economic benefits of this form of transportation are, in fact, sufficient to justify the substantial subsidies paid for this mode, either in relation to other forms of transportation or other social and economic development programs of the federal government.

Another important issue concerns the cost at which those services are provided. Railway charges constitute 60 per cent of all VIA Rail costs and are levied in accordance with CTC Costing Order R6313, which many believe is inappropriate for this type of service. This "cost plus" method of charging provides no incentive to reduce costs, improve efficiency, or eliminate antiquated work rules. Under this system, VIA Rail does not exercise direct control over its costs and only determines its final costs "after the fact". Moreover, without financial targets for specific services and with ministerial direction as to services to be reinstituted and equipment to be purchased, VIA Rail is in the unenviable situation of having to provide a consumer service over which it has little or no cost control.

Proposed rail passenger legislation attempts to deal with these issues by establishing cost recovery targets on a "use it or lose it" basis for the different classes of service, by providing VIA Rail with more direct control, and by establishing a phased reduction in the cost envelope within which VIA Rail must operate. That envelope, however, may well be inconsistent with the range of services VIA Rail is expected to provide and VIA Rail's ability to increase revenue.

Clearly, except for a very small number of remote services, there is no transportation need for subsidized rail passenger service. In most cases, a wide range of adequate, lower cost alternatives are available to the public. Moreover, although recent Cabinet decisions and pending legislation reflect a continuing commitment to support rail passenger service, at least on a selective basis, the spirit of these policies emphasizes a phased reduction in subsidies and suggests that unless certain services achieve improvement in financial performance, they will be discontinued.

Accepting the constraints of current government policy, the major themes of the study team's assessment are:

a. Methods of achieving greater cost recovery through increased user charges established in accordance with the market being served.

b. Methods of reducing the costs of delivering those services that will remain through institutional changes that permit VIA Rail to carry out its responsibilities in a more cost effective and commercial manner.

c. Postponement of unnecessary capital investment in equipment and facilities that may become redundant or may perpetuate the continuation of services that fail to meet financial targets.

d. Dissemination of information to the public on the real costs of rail passenger service.

VIA RAIL PASSENGER SERVICE SUBSIDIES

DESCRIPTION

This program plans the network of rail passenger services operated by VIA Rail under contract to Transport Canada and payment of 100 per cent of the shortfall between revenue and total costs (composed of railway charges and VIA Rail's own expenses).

AUTHORITY

Payments made to VIA Rail are for specific services approved by the minister on an annual basis.

OBJECTIVE

To maintain services that are not commercially viable, promote improvement in the quality of rail passenger service, and increase the extent to which VIA Rail is responsive to the policies of the minister.

BENEFITS AND BENEFICIARIES

Users -	low tariffs, improved comfort and reliability, and, in remote areas, guarantee of adequate accessibility.
Economy -	stimulation of tourism and secondary economic benefits.

EXPENDITURES ($000)

	84/85	85/86
CAP	-	-
O&M	2,100	2,100*
Transfer	477,457	600,000
Total	479,557	602,100
Revenue	-	-
Net Cost	479,557	602,100
Person-years	25	25*

* Estimated

Notes: Transfer payments under this program represent 100 per cent of the shortfall between total costs and revenues in 1984/85.

In 1984, VIA Rail revenues of $168 million represented 65 per cent of VIA Rail costs ($259 million) excluding railway charges, or 26 per cent of total costs ($643 million).

For VIA Rail services, railways are compensated for 100 per cent of their costs calculated according to CTC Costing Order R6313. These railway charges are about 60 per cent of all VIA Rail costs. The most significant cost component is equipment maintenance.

Capital expenditures for new cars and locomotives to be acquired from 1985/1990 are estimated at approximately $550 million.

A limit of payments to VIA Rail has been established at $600 million in 1985/86, declining to $400 million by 1989/90. These limits include the portion of capital costs for new equipment incurred in any one year, as well as losses on services ordered to be reinstated by the minister.

Person-years and costs of CTC audits of railway charges for VIA Rail services are not shown. For 1985/86, seven person-years are assigned to this activity.

OBSERVATIONS

Since the establishment of VIA Rail in 1979, the railways have been relieved of almost all cost responsibility for passenger services. (A few intercity services not assumed by VIA Rail are still operated by the railways as shown in Rail Passenger Service Subsidies.) Over this period, the unit cost of rail passenger service has increased while revenues and passengers carried have declined.

Successive governments have supported the provision of uneconomic rail passenger service on grounds of social objectives and national unity.

Information on the costs, revenues and ridership associated with specific services is not in the public domain.

Two recent major opinion polls show that about 77 per cent of those sampled believe rail passenger service should be improved but between 53 per cent and 60 per cent believe these services should not be subsidized. Less than 10 per cent of those interviewed had used VIA Rail during the preceding year.

Rail passenger service (in terms of passenger kilometres) accounts for approximately 6 per cent of all inter-city common-carrier passenger travel, compared to 85 per cent for air, and 9 per cent for bus.

VIA Rail services can be grouped into four major categories that involve distinctly different operating environments and markets:

a. Transcontinental services that contribute to national unity and promote tourism;

b. Corridor services that operate in highly competitive markets where a wide variety of air and bus alternatives exist;

c. Regional services where there is relatively less competition from other modes; and

d. Remote services where travel alternatives are severely limited.

Recent government announcements distinguish between the need to subsidize transcontinental, regional and remote services and the need to achieve full cost-recovery on corridor (i.e. Quebec - Windsor) services.

As shown in Annex A, in 1984 remote services recovered 12 per cent of total associated costs, regional services 19 per cent, transcontinental services 25 per cent, and corridor 35 per cent. For individual routes, cost recovery ranged from less than one per cent (Hearst-Nakina) to 43 per cent (Ottawa-Toronto).

While government policy has consistently emphasized VIA Rail's role with respect to transcontinental service and remote regions, VIA Rail management appears to have placed more emphasis on dramatic improvements in corridor services (Quebec-Windsor) where a multiplicity of competing air and bus services as well as first-class highways are available.

VIA Rail's subsidized fares have an adverse effect on private bus operators on competitive routes and result in insufficient returns for the bus industry to invest in product and service improvements.

The organizational structure for service planning is complex. Railway charges are audited by the CTC without VIA Rail itself having access to the same cost data for purposes of service planning. VIA Rail's costs are reviewed and approved by the Rail Passenger Directorate of Transport Canada which also engages in service and route planning so as to provide advice to the minister. The minister makes decisions with respect to both cancellation and establishment of specific services. In this setting, VIA Rail has a great deal of responsibility with little final authority.

VIA Rail's ability to manage the use of available financial resources in accordance with internal corporate priorities is affected significantly by external priorities imposed by the government, including new services ordered by the minister, and the acquisition of new equipment for which VIA Rail management has little influence on either the establishment of equipment specifications or the selection of suppliers.

Service quality and on-time performance of VIA Rail have been criticized by the CTC in a special inquiry which led to the establishment of an Action Force on VIA Rail. The findings of the Action Force were not made available to the study team.

KEY ISSUES

Are the social and secondary economic benefits of rail passenger service sufficient to justify the large subsidies paid for this mode in relation to other federal government social and economic development programs?

Does confidentiality and the lack of public information on the costs of rail passenger service perpetuate uninformed opinion and inhibit rational policy development?

Should the government provide large direct subsidies to rail passenger services that could influence passengers' choice of mode when no such support is provided to competing, privately operated air and bus services?

What is the basis for determining public "need" for subsidized rail service where alternatives exist?

Will changes in airline regulation policy adversely affect VIA Rail ridership and revenues?

Could higher cost recovery be achieved for selected routes (e.g. corridor routes) and services (e.g. food and beverages, sleeping accommodation)?

To what extent should VIA Rail enjoy the freedom to establish corporate priorities independently of government intervention, given its dependency on direct government funding?

Does CTC Costing Order R6313 represent a fair basis for compensating the railways for the costs of operating passenger trains on behalf of VIA Rail?

What means could be used by VIA Rail to lower the costs of equipment maintenance?

ASSESSMENT

In the view of the study team, there is a need for greater public dialogue on rail passenger service, based on factual information pertaining to costs, revenues, subsidies, and market shares of all modes of inter-city passenger travel.

The study team believes that, except for a very small number of remote services (e.g. Churchill), there is no transportation need for subsidized rail passenger service because adequate, lower cost alternatives exist.

Subsidies for rail passenger service as a means of achieving other non-transport objectives have never been evaluated in terms of opportunities foregone in other social and economic sectors.

In almost all cases, the diversion of rail subsidies to alternative modes would reduce net public cost and improve service quality. However, extension of passenger subsidies to new modes would, in most cases, be inconsistent with the proposed economic regulatory reform in Freedom to Move.

Although the full effect of further airline deregulation on airfares cannot be assessed at this time, there is a strong likelihood that VIA Rail ridership and revenue will be eroded in certain markets.

Recent surveys indicate that, when presented with factual information on the nature of rail passenger costs, revenues, and use, a significant proportion of the public withdraw their support for the large subsidies now paid by government.

Nevertheless, in light of recent government decisions and pending legislation (see Annex B) which emphasize improvement in trans-continental and regional services (non-corridor) in response to currently perceived public preferences, there are opportunities for reducing the net public cost of those rail passenger services which the government decides to retain in the near term. For those services, the following assessments are made.

In many cases, users are more sensitive to service quality and reliability than fares (since lower priced bus alternatives generally exist). As a result, for markets where rail service enjoys a competitive advantage, VIA Rail should, the study team believes, be able to charge higher fares for improved service and achieve higher cost recovery.

The present process in which VIA Rail negotiates with the railways, the CTC audits railway charges, and Transport Canada monitors VIA Rail costs and approves subsidies, is too cumbersome and lengthy to permit effective management.

Railways are entitled to a reasonable contribution to overhead from services provided to VIA Rail; however, realistic incentive schemes are required to improve the efficiency of passenger train operations.

There is considerable doubt that CTC Order R6313, which is based on the concept of long-term variable cost, is an appropriate vehicle upon which to base the railways' charges to VIA Rail. The proposed passenger legislation re-orients this direction towards short-term avoidable costs. There is strong opposition from the railways to this change as it might, in the end, lead to their indirect subsidization of

VIA Rail. Fixed price contracts, negotiated between willing partners, negate the need for detailed costing regulations and audits.

Firm price as opposed to "cost plus" contracts between VIA Rail and the railways should lead to improvements in the quality of service and incentives for cost reduction.

The study team believes that, in view of the surplus capacity that exists to maintain railway equipment, a benefit/cost analysis of options for contracting out equipment maintenance should be carried out prior to any investment in new VIA Rail maintenance facilities.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. To assist elected officials in promoting constructive public debate on rail passenger services, publish facts on VIA Rail's costs, revenues, and ridership on a route-specific basis semi-annually.

2. Until the long-term future of its existing services is determined, postpone major capital investments in new equipment for VIA Rail other than that which is essential for transcontinental and remote services.

3. Require demonstration to the government that VIA Rail has given adequate consideration to alternatives such as contracting for equipment maintenance before committing to major capital investment in new maintenance facilities.

4. Given VIA Rail cost-recovery objectives for each distinct class of service (trans-continental, corridor, regional, and remote) based on methods of cost determination that are consistent over time.

5. For Quebec-Windsor corridor services, where adequate alternatives exist, price VIA Rail services so as to achieve full cost recovery.

6. Phase out VIA Rail services that fail to achieve cost recovery targets.

7. Price VIA Rail's on-board services to recover full costs.

8. Concentrate responsibility for monitoring and reviewing VIA Rail performance (now divided between the CTC and Transport Canada) in Transport Canada.

9. Consistent with the concept of greater corporate accountability for VIA Rail within stated financial constraints, as intended in pending legislation, person-years assigned to Transport Canada rail passenger programs should be reduced significantly.

10. VIA Rail and the railways should negotiate firm prices for specific services and service changes that include a fair and reasonable contribution to railway overhead, thereby eliminating the need for compulsory audits and associated CTC person-years. In these negotiations, VIA Rail and the railways should have the same recourse under law as in any other commercial arrangement.

ANNEX A

1984 VIA RAIL STATISTICS

ROUTE NAMES	Total Passengers (Actual)	Total Passenger Miles (000)	Railway Charges ($000)	VIA Cost ($000)	Total Cost ($000)	Total Revenue ($000)	Deficit ($000)	Rev./ Cost (%)	Deficit per Pass. Mile (¢)	Deficit per Pass. ($)
Montreal - Vancouver	550,674	408,080	96,309	93,671	189,980	44,488	145,492	23	36	264
Montreal - Halifax	468,389	179,825	32,285	26,324	58,609	17,467	41,142	30	23	88
TRANSCONTINENTAL	**1,019,063**	**587,905**	**128,594**	**119,995**	**248,589**	**61,955**	**186,634**	**25**	**32**	**183**
Montreal - Quebec	365,764	49,453	15,123	7,120	22,243	5,743	16,500	26	33	45
Montreal - Ottawa	372,238	38,530	10,498	5,518	16,016	4,544	11,472	28	30	31
Ottawa - Toronto	325,656	63,236	9,680	7,735	17,415	7,575	9,840	43	16	30
Toronto - Montreal	1,552,943	372,184	63,257	37,972	101,229	41,441	59,788	41	16	38
Toronto - Kingston	77,331	8,148	7,118	933	3,051	987	2,064	32	25	27
Toronto - Windsor	797,548	104,361	25,057	15,779	40,836	13,196	27,640	32	26	35
Toronto - Stratford - London	623,229	38,840	11,581	5,138	16,719	4,614	12,105	28	31	19
Toronto - Sarnia	411,581	42,313	14,206	6,492	20,698	5,098	15,600	25	37	38
Toronto - Niagara Falls	250,762	14,264	4,682	1,836	6,518	1,489	5,029	23	35	20
CORRIDOR	**4,777,052**	**731,329**	**156,202**	**88,523**	**244,725**	**84,687**	**160,038**	**35**	**22**	**34**
Calgary - Edmonton	61,901	9,790	2,558	1,285	3,843	794	3,049	21	31	49
Victoria - Courtenay	41,183	3,744	1,338	373	1,711	333	1,378	19	37	33
Winnipeg - Saskatoon	15,056	4,773	3,531	1,200	4,731	360	4,371	8	92	290
Saskatoon - Edmonton	10,465	2,802	2,518	776	3,294	252	3,042	8	109	291
Montreal - Gaspé	126,088	45,927	14,923	9,682	24,605	4,927	19,678	20	43	156
Halifax - Yarmouth	59,761	7,160	2,098	981	3,079	765	2,314	25	32	39
Campbellton - Moncton	33,409	4,117	2,052	654	2,706	446	2,260	16	55	68
Halifax - Sydney	170,955	21,201	6,223	2,557	8,780	1,876	6,904	21	33	40
Halifax - St.John - Fredericton	113,344	14,390	4,539	1,884	6,423	1,335	5,088	21	35	45
Moncton - Edmunston	3,494	607	167	90	257	62	195	24	32	56
REGIONAL	**635,656**	**114,511**	**39,947**	**19,482**	**59,429**	**11,150**	**48,279**	**19**	**42**	**76**

1984 VIA RAIL STATISTICS

ROUTE NAMES	Total Passengers (Actual)	Total Passenger Miles (000)	Railway Charges ($000)	VIA Cost ($000)	Total Cost ($000)	Total Revenue ($000)	Deficit ($000)	Rev./ Cost (%)	Deficit per Pass. Mile (¢)	Deficit per Pass. ($)
The Pas - Lynn Lake	9,616	938	807	428	1,235	104	1,131	8	121	118
Winnipeg - Churchill	45,501	12,819	12,949	5,913	18,862	1,457	17,405	8	136	383
Churchill - Wabowden	1,154	72	230	110	340	6	334	2	464	289
Thunder Bay - Sioux Lookout	1,785	120	906	118	1,024	14	1,010	1	842	566
Farlane - Winnipeg	10,520	1,073	733	143	876	120	756	14	70	72
Sudbury - White River	2,377	188	244	42	286	14	272	5	145	114
Capreol - Winnipeg	34,418	8,147	7,810	2,470	10,280	889	9,391	9	115	273
Hearst - Nakina	384	35	699	123	822	6	816	1	2,331	2,125
Ottawa - Sudbury	12,030	3,092	1,111	366	1,477	240	1,237	16	40	103
Montreal - Chicoutimi	22,030	4,170	3,616	1,174	4,790	409	4,381	9	105	199
Montreal - Cochrane	39,873	6,680	6,103	2,870	8,973	840	8,133	9	122	204
Edmonton - Prince Rupert[1]	14,576	6,776	3,553	1,883	5,436	641	4,795	12	71	329
Winnipeg-Edmonton-Prince Rupert[2]	78,369	43,106	13,126	7,908	21,034	4,098	16,936	19	39	216
Toronto - Kapuskasing	65,234	12,606	7,254	7,380	14,634	1,725	12,909	12	102	198
REMOTE	337,967	99,822	59,141	30,928	90,069	10,563	79,506	12	80	235
SYSTEM TOTALS	6,769,638	1,533,567	383,884	258,928	642,812	168,355	474,457	26	31	70

[1] To end of June, 1984.
[2] From July, 1984.

ANNEX B

PROPOSED CHANGES IN RAIL PASSENGER LEGISLATION

Although details of proposed rail passenger legislation have, as yet, not been made public, we are led to believe that the proposed legislation has as its major objective, the establishment of VIA Rail Canada as a Crown corporation that would be governed by the following:

a. For all VIA Rail services, a major distinction is to be made among trans-continental, regional, and corridor classes of service, with specific performance targets to be established on a route specific basis.

b. For the trans-continental services, a cost recovery target of 60 per cent, is to be achieved by the end of 1988 with a reduction in frequency of service where this target is not met, but there is no suggestion that these services would be discontinued entirely.

c. For the corridor services, a cost recovery target of 100 per cent is to be achieved by the end of 1987 and for regional services, a cost recovery target of 40 per cent, is to be achieved by the end of 1988. Where these targets are not achieved, services would be discontinued unless a provincial government agency is prepared to make-up the short-fall between the established cost recovery target and actual performance.

d. The federal government is to acquire new cars and locomotives for the trans-continental and regional services over the period 1985 to 1990 at a total estimated cost of $550 million.

e. Limits are established for the total annual funding to be made available for rail passenger services, including both operating subsidies and the foregoing capital expenditures, as follows:

YEAR	$ MILLIONS - CURRENT
85/86	600
86/87	500
87/88	500
88/89	450
89/90	400

CTC RAIL PASSENGER SERVICE SUBSIDIES

DESCRIPTION

Payments by the CTC of 80 per cent of the operating losses on uneconomic non-VIA Rail services operated directly by the railways beginning 90 days after application for discontinuance and continuing until such time as discontinuance is approved.

AUTHORITY

Sections 260 and 261 of the Railway Act.

OBJECTIVE

To relieve the railways of most of the costs of uneconomic passenger services provided as an imposed public duty, while maintaining some degree of railway responsibility to minimize losses.

BENEFICIARIES

Users -	low tariffs and, in remote areas, guarantee of adequate accessibility.
Economy -	stimulation of tourism and secondary economic benefits.

EXPENDITURES (85/86)	($000)
CAP	-
O&M	154
Transfer	10,700
Total	10,854
Revenue	-
Net Cost	10,854
Person-years	4

Notes: Since the establishment of VIA Rail, few services have remained eligible for CTC subsidies.

Transfer payments are budgeted cumulative values to be disbursed in 1985/86 including losses determined for previous years. For 1985/86, 80 per cent of the estimated losses on three rail lines total $7.2 million.

Person-years and costs of CTC audits of railway charges for VIA Rail services are not included. For 1985/86, seven person-years are assigned to this activity.

OBSERVATIONS

The establishment of two separate programs for rail passenger subsidies (CTC and VIA Rail) appears more accidental than explicit.

Some of the CTC subsidized services involve mixed trains (freight and passenger) for which no mechanism now exists to permit VIA Rail to assume responsibility.

In theory, CTC subsidies paid under this program are 20 per cent lower than would be the case if the services were the responsibility of VIA Rail (see VIA Rail Passenger Service Subsidies).

KEY ISSUES

Is there a rationale for maintaining two separate rail passenger programs?

Why should some passenger rail services be subsidized less than others?

ASSESSMENT

In the view of the study team, the existence of two rail passenger programs results in unnecessary duplication of activities and staff.

There is no rationale for maintaining separate programs or separate subsidy ratios since through the establishment of VIA Rail, the government adopted a policy of relieving the railways of costs associated with operating uneconomic passenger service.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Transfer services subsidized by the CTC to VIA Rail, to be absorbed within VIA Rail's existing budget and terminate the program.

2. VIA Rail should negotiate firm prices for passenger service provided by railways other than CN and CP.

3. The priority of these services relative to other VIA Rail services should be determined within the budgetary limits imposed on VIA Rail.

GRAIN TRANSPORTATION

OVERVIEW

Bulk commodity movements originating in western Canada and destined for overseas increased dramatically from the early 1960s onwards. By the late 1970s, projections of continuing growth, raised serious questions as to the ability of the Canadian railway system to handle these movements without significant expansion in capacity. Indeed, the investment required for the necessary expansion was estimated by the railways at one stage to be in the order of $13 billion. Failure to provide for this magnitude of investment raised the specter of rail capacity rationing with significant implications for the economy of Canada in general, and that of western Canada specifically.

The "Crow" grain rates fixed by federal statute at 1897 levels ceased to cover the cost of moving grain sometime following the Second World War, a fact recognized by various Commissions and Inquiries. As a result, the railways permitted their fleet associated with grain movements to run down and also deferred maintenance on the branchline network leading to its deterioration.

To alleviate the problems associated with the movement of grain for export destinations and to compensate the railways for past losses incurred in grain movements, the federal government entered into a dual program of hopper car purchases/leasing and branchline rehabilitation. The acquisition of hopper cars commenced in 1973 and, over time, involved a total expenditure of $587.6 million for 13,120 cars. In 1980/81, an additional 2,000 cars were acquired on a 25-year lease arranged in the U.S., at an annual cost of about $18 million (depending on currency fluctuations).

The branchline rehabilitation program in respect to grain dependent lines (defined as those lines over which export grain accounts for more that 60 per cent of the total traffic carried by volume) commenced in 1977. The majority of these lines are located in the Prairies and they are protected against abandonment by Order-in-Council up until the year 2000 as they form part of the "permanent network". As of March 31, 1985 some $627.8 million had been expended on the program with authorization for an additional sum of $387.2 million for the period to 1989. Therefore the total rehabilitation program costs are projected at $1.015 billion and involve approximately 6,000 miles of rail line. In addition, $51.3 million is available in the System Improvement Reserve for non-rail initiatives to enhance efficiency over the 1986/89 period.

Losses associated with the "Crow" rates were cited by the railways as constituting an inhibiting factor in raising the capital required for capacity expansion. In early 1982, the federal government began a process aimed at altering the "Crow" rates which culminated in November 1983 with the passage of the Western Grain Transportation Act (WGTA). The Act's provisions include: federal government payments to railways plus higher payment by grain shippers to cover new, cost-related rates; new regulatory and advisory machinery aimed at implementing the Act and improving the overall grain transportation system; and a timetable for reviews of the Act's operation which may involve further public debate and lead to amendments to the statute.

In 1984, the first year in which subsidies (the "Crow" Rate Benefits) were paid under the WGTA, government payments to the railways totalled $589.7 million In addition, under the At&East subsidy program, $15 million was paid in respect of grain and $22.9 million for flour. Some smaller sums were also expended under the Atlantic Region Freight Assistance (ARFA) subsidy program for grain and flour processed and distributed within the Atlantic region.

It is obvious from the above that direct federal government expenditures associated with grain transportation are very large. It is also apparent that other federal government involvement in the grain industry through regulation (the Canadian Wheat Board, the Canadian Grain Commission, etc.) is extensive. This involvement, according to the industry, restricts creativity and innovation, limits industry's ability to take advantage of unanticipated sales opportunities, and constrains potential transportation cost savings.

The Canadian grain industry faces severe competition in world markets. With a 20 per cent share in these markets, Canada can not influence price but is a price taker. The market itself is changing with some traditional importing countries becoming net exporters (e.g. India, U.K.) or achieving self-sufficiency (e.g. China). In the future, greater emphasis may have to be placed on Third World countries who demand primarily utility grade as opposed to the premium grade grain produced in Canada. Additionally, some grain exporters (e.g. the EEC and Argentina) receive government subsidies and some of our major competitors enjoy a competitive advantage in transportation because they incur shorter land-hauls in respect of grain (on average 900 miles in Canada vs. 400 miles in the U.S. and 40 miles in Australia).

A cost-effective transportation system is essential if Canada is to preserve its position in the world grain trade despite the factors mentioned above. Therefore the grain collecting, handling and distribution system needs to be further consolidated so as to achieve additional savings in transportation costs. It is the firm conviction of the study team that the best environment in which to achieve this is one driven by market forces.

The proposed revisions to the National Transportation Act (Freedom to Move) state that ... "An additional protection for grain dependent branchlines will be maintained; the Order-in-Council that protects the majority of these will have to be altered before abandonment proceedings commence". To the extent that this implies that the Order-in-Council can or will be altered, the study team is in agreement. The study team has concluded that the grain dependent branchlines should be treated in a similar manner to other branchlines, i.e. choosing the least-cost alternative. The study team also endorses the relevant recommendations of the recently completed CTC "Report of the Inquiry into Railway Branchlines" as they pertain to branchline cost disclosure, subsidy diversion, choice of the lowest cost transportation alternative and changes to the process followed by the CTC, including the setting of strict time limits on proceedings.

Within this framework, the major themes of the study team's findings are directed to measures that will facilitate further consolidation and efficiency in the system, and encourage it to move towards a commercially-oriented market driven environment through:

a. Making payments under the WGTA directly to the producers so that they can purchase the type of transportation they believe is most advantageous;

b. Allowing the use of incentive freight rates without restriction;

c. Transferring ownership of hopper cars to the railways under suitable terms and conditions;

d. Revoking the policy of guaranteed preservation of branchlines;

e. Allowing diversion of subsidy funds to the least cost transportation alternative or, in special circumstances, permitting one-time payments to facilitate abandonments;

f. Excluding the Port of Churchill from the grain distribution system unless there are compelling reasons to the contrary identified in the Canada/Manitoba study; and

g. Placing the Grain Transportation Agency on a cost recovery basis and, once the grain distribution and handling system becomes more market driven, ultimately phasing it out.

Note: This Overview should be read in conjunction with the Railway Freight Overview.

GRAIN TRANSPORTATION

DESCRIPTION

Grain Transportation: The identification and analysis of grain handling and transportation problems and the provision of advice and guidelines relating to grain transportation.

Grain Transportation Agency (GTA): Responsible for the co-ordination and allocation of grain cars to the Canadian Wheat Board (CWB), the grain industry, and producers. It is also responsible for ensuring that the grain transportation system is efficient and reliable.

Branchline Rehabilitation: Specified lines placed within a permanent network by Privy Council Orders are eligible for rehabilitation to agreed-upon standards.

Acquisition and Leasing of Hopper Cars: The acquisition and financial control of the federal government's fleet of grain hopper cars.

AUTHORITY

Western Grain Transportation Act (WGTA); Cabinet and Treasury Board decisions.

OBJECTIVES

To ensure an adequate, reliable and efficient gathering and distribution system for the movement of Canadian grains to export and domestic markets.

BENEFICIARIES

The major beneficiaries are the grain producers of Western Canada. There are also significant employment and balance of payment benefits to Canada.

EXPENDITURES (84/85)	($000) **GT**	**GTA**	**HOPPER**	**TOTAL**
CAP		215	17,718	17,933
O&M	620	2,865		3,485
Transfer	120,400*		95,900	216,300
Total	121,020	3,080	113,618	237,718
Revenue	-	-	-	-
Net Cost	121,020	3,080	113,618	237,718
Person-years	3	34		37

* Resources for branchline rehabilitation are subsumed in Grain Transportation (GT).

Notes: Expenditures of $520 million are earmarked for the Branchline Rehabilitation Program over the 1984-89 period. In addition, $51 million is available in a System Improvement Reserve (SIR) for non-rail initiatives for the 1986-89 period to enhance efficiency.

Subsidies (the Crow Rate Benefit) under the WGTA which are excluded from the mandate of the study team were $599 million in 1984. These are paid by the CTC.

Some additional personnel in the Freight Directorate could be involved in grain-related research.

The $17.7 million represents annual leasing costs in respect of hopper cars. These leases run to the year 2005. The $95.9 million was for the purchase of the last order of cars.

OBSERVATIONS

The "Crow" grain rates, fixed by federal statute at 1897 levels, ceased to cover the cost of moving grain sometime during the post-war period. The railways allowed their fleet utilized in grain movements to diminish and also deferred maintenance on the branchline network. To assist the movement of Canadian grain for export and to compensate the railways for past losses incurred in transporting grain, the federal government entered into a dual program of hopper car purchasing/leasing and branchline rehabilitation.

The WGTA, passed in 1983, includes the following provisions: federal government payments to railways plus higher payments by grain shippers to cover new, cost-related rates; new regulatory and advisory machinery aimed at implementing the act and improving the overall grain transportation system; and a timetable for reviews of the act's operation which may involve further public debate and lead to amendments to the statute.

In the view of the study team, a cost-effective transportation system is essential because the Canadian grain industry faces severe competition in world markets.

The study team also believes that the scale of government involvement in the grain industry is an inhibiting factor. Federal regulations restrict industry creativity and innovation and seriously limit its ability to take advantage of unanticipated sales opportunities and constrains transportation cost savings which otherwise would be achieved.

Concerns about grain transportation are often expressed by producers who are too far removed from the market place to appreciate the full complexity of the grain handling, transportation and marketing system.

Further consolidation of the grain collection, handling and distribution system is inevitable. There is a substantial body of opinion that a fragmented approach to consolidation has perpetuated a high-cost system, and less regulation is required to allow greater efficiency and cost savings.

The CWB is a government agency responsible for marketing a large proportion of selected export grains. Its influence is pervasive, being closely involved in the production, collection, transportation and marketing of grains.

The need for federal involvement in the hopper car program has now disappeared.

Government hopper cars, when not needed for grain movements, are under-utilized because the leasing rates sought by the government are commercially unattractive (they do not reflect current market conditions). This action runs counter to basic commercial principles and works against efficient use of the hopper car fleet.

The federal government's program for rehabilitating grain-dependent branchlines (where export grain is more that 60 per cent of traffic by volume) is excessive and rigid, and is based on an existing system that does not permit innovation or allow for the consideration of alternatives (e.g. trucking).

The economic competitiveness of shipping grain through the Port of Churchill, and other factors affecting its viability, are currently being assessed under a Canada/Manitoba study as a basis for deciding on its continuing use for grain and other commodities.

The Senior Grain Transportation Committee (SGTC) was established by the WGTA. The SGTC can recommend to the Minister the disposition of funds contained in the System Improvement Reserve ($51 million) for non-rail initiatives.

The GTA provides support services to the SGTC and appears to perform a valuable function in respect to ports coordination and car allocation. It also provides forecasts to the CTC for rate-making purposes and sets performance targets for the carriers. The GTA was recently requested by the minister to undertake a review of the WGTA.

The GTA was authorized to make payments of $650,000 over the 1985-87 period to four trucking companies adversely affected by the WGTA. The payments were originally for a one-year period but were subsequently extended.

A user charge to support the GTA (e.g. per tonne of grain shipped) would probably be acceptable to the industry and would help to maintain the agency at an appropriate size.

There are precedents for this approach in the arrangements for the CWB and the Canadian Grain Commission.

Within a commercial environment, car allocation could be negotiated without the need for third party involvement.

KEY ISSUES

Should payments under the WGTA be made to the producer or the railways?

Should incentive freight rates be permitted?

Should the Government of Canada continue to be in the hopper car business?

Should the railways have unrestricted use of federal government hopper cars?

Should the Branchline Rehabilitation Program be continued in its present form?

Should the shortline rail or other options be pursued?

Should the Port of Churchill play a role in the export of grain?

Is there a continuing role for the GTA?

ASSESSMENT

System

The study team believes that for the Canadian grain industry to remain competitive in world markets, the grain collecting, handling and distribution system needs to be further consolidated in a manner that will achieve additional savings in transportation costs. This process of consolidation could be facilitated and the total system moved towards a commercially-oriented market-driven environment by:

a. making payments under the WGTA directly to the producers, so they can purchase the type of transportation they want, as recently proposed by the Hall Inquiry on Method of Payment;

b. permitting incentive freight rates; and

c. allowing branchline abandonment where less costly transportation alternatives exist.

Hopper Cars

The hopper car program was justified at the time of its inception. Adequate fleet capacity is now in place and with rates determined under the WGTA, the railways should be in a position to ensure adequate car replacement. As a result, there is no need for continuing government involvement in this program in the view of the study team.

Overall efficiencies would result if the government hopper cars were turned over to the railways and fully integrated into their fleets. The terms and conditions of the transaction must include performance guarantees that would discourage the railways from not meeting their commitment to the transportation of grain.

The "Efficiency" sub-committee of the SGTC is reviewing the use of hopper cars for the purpose of improving car cycle times. The study team supports the sub-committee's efforts.

Branchline Rehabilitation

Delayed maintenance of branchlines by the railways due to inadequate compensation for the transportation of grain has led to serious deterioration of the Prairie branchline network and justified a program of rehabilitation. The very high costs involved and inherent rigidities in the system, however, raise serious questions as to the scope of the remaining program for low density branchlines. Alternatives to major rehabilitation, including trucking alternatives, abandonments, and one-time lump-sum payments to producers and communities adversely affected by such abandonments should be considered.

For a shortline operation to be successful, traffic density and traffic diversity are paramount factors. Other requirements are favourable labour agreements, local institutional support and operational competence. For grain dependent lines, the traffic-related elements are unlikely to be present. In all instances, least-cost transportation alternatives ought to be examined in the study team's view.

Port of Churchill

It is generally believed by the grain industry and railways that the high costs and low capacity of the rail line to Churchill, the short navigational season, high insurance premiums and the restricted capability of the Port, all point to the conclusion that the Port should be excluded from the grain distribution system.
Notwithstanding this negative outlook, the study team took note of the fact that a federal/provincial study on the potential for the Port of Churchill had been initiated and a report is due by the end of 1985. The study team suggests

that results of this study be awaited before a final decision is taken on the Port's future involvement in grain distribution.

Grain Transportation Agency

The GTA was established primarily to counter real or perceived injustices in the allocation of cars between board and non-board grain. There is an inherent danger because once government agencies are created, they have a tendency to expand beyond their original mandate. Desirable changes in grain handling and distribution leading to a market-driven system should eventually eliminate the need for the GTA.

The Study Team on Agricultural Programs proposed that the 1985/86 comprehensive review of the WGTA address a number of issues. These include selling hopper cars owned and leased by the federal government to the railways; examining branchline costing or variable pricing to determine if branchlines should be eliminated or retained; examination of car allocation procedures and delivery quotas so as to increase car turnaround times; re-examining compensation procedures for western grain in light of Judge Hall's report; and reviewing the continuing need for the GTA. The study team is in agreement with this proposal.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Payments under the Western Grain Transportation Act should go directly to the producers as recommended by the Hall Inquiry into Method of Payment.

2. Extend utilization of incentive freight rates without restriction and be encouraged by allowing the railways to retain a reasonable proportion of the productivity gains which result from these rates.

3. Transfer of ownership of the hopper cars under suitable terms and conditions should be negotiated with the railways. The transaction should include leased cars and attendant leasing costs, and the railways should be allowed to recover the leasing

costs in the grain freight rates. In the interim, review the leasing contract with the objective of cost-minimization, including the use of cars for other traffic, with appropriate performance guarantees for grain movement.

4. As an interim measure, place the Grain Transportation Agency on a cost-recovery basis.

5. Transport Canada resources devoted to this program should be reduced to a core group of 8 - 12 professional and support staff to advise the minister on various railway freight and grain issues of regional or national significance. (See also Railway Freight.)

6. The policy of guaranteed preservation of branchlines should be revoked.

7. Consider alternatives to significant investment in branchline rehabilitation, including rail branchline abandonments, trucking alternatives, and possibly one-time lump-sum payments to producers and communities adversely affected. Consistent with the CTC "Report of the Inquiry into Railway Branchlines", legislation could be amended to allow flexibility in the disbursement of funds to the least-cost transportation alternative.

8. Exclude the Port of Churchill from the grain distribution system, effective with the 1986 shipping season, unless there are compelling arguments to the contrary contained in the Canada/Manitoba study on the Port of Churchill, scheduled for completion in December 1985.

9. If the above priority measures are adopted and the grain handling and distribution system thereby becomes more market-driven, then the Grain Transportation Agency could be phased out.

RAILWAY FREIGHT

OVERVIEW

Many railway branchlines in Canada lose money as revenues are insufficient to cover operating costs, or do not provide for any contribution to overhead. However, to protect shippers, no branchline may be abandoned except on successful application to the Canadian Transport Commission (CTC) under Section 256 of the Railway Act. Under this Section, the CTC is authorized to pay subsidies equivalent to 100 per cent of the operating losses (excluding any contribution to overhead) on a branchline commencing 90 days after application with the subsidy continuing so long as the line is kept in operation. Thus, even where discontinuance is allowed, the railways are eligible for compensation of losses incurred during the decision-making process.

On December 21, 1984, the Minister of Transport wrote to the CTC requesting that applications on branchline abandonnants be held in abeyance until the Senior Commissioner of the CTC's Western Division completed an inquiry. The CTC interpreted that letter in such a way that the common perception is that a "moratorium" exists on branchline abandonments, although in fact a very small number of cases were decided during the period of the study.

Because of the government's preoccupation with the use of rail as the basic element of the grain gathering system, grain movements on branchlines have been designated for special consideration. As a result, Section 40 of the Western Grain Transportation Act defines two categories of branchlines:

a. Grain dependent lines, located mainly in the three Prairie provinces, over which export grain constitutes more than 60 per cent of the traffic carried by volume (see also Grain Transportation); and

b. "Non-Prairie" lines, located in the other seven provinces, over which export grain constitutes less that 60 per cent of traffic moved by volume.

The majority of grain dependent branchlines are protected against abandonment to the year 2000 by Order-in-Council.

To place the "non-Prairie" branchline subsidies under consideration in perspective, it is important to note that in some cases, very large subsidies are paid in respect of lines with very little traffic. For example, on the Temiscamingue and Ville Marie subdivision, payments are estimated at $1 million for 1985 (1984 actual traffic was three cars), the same as on the Ste. Agathe subdivision for which payments are again estimated at $1 million (1984 volume of 233 cars). At the other end of the subsidy spectrum, on the Nickel subdivision the payment was $1,000 but there was no movement of traffic in 1984.

It is clear that existing legislation in respect of branchline abandonments and the associated process are rigid, time-consuming, and costly to the taxpayer. No flexibility is permitted in the disbursement of funds so as to allow subsidy diversion to lower cost transportation alternatives. The lengthy delays in the CTC hearing and decision-making process and the "moratorium" on abandonment all increase public costs needlessly.

The U.S. and Canadian situations provide an interesting contrast. The precarious financial position of a number of U.S. railways in the late 1970s led to the Staggers Rail Act of 1980 which radically altered the regulation of railways in the U.S. Total trackage for Class 1 railways in the U.S. declined from 277,240 miles in 1979 to 255,748 miles in 1984 (a decrease of 7.8 per cent) as a result of abandonments and transfer of trackage to other operators. Their return on investment improved from 2.93 per cent to 5.71 per cent over the corresponding period. In contrast, CN and CP's total trackage stood at 45,563 miles in 1979 and was 44,606 miles in 1984 (a decrease of only 2.1 per cent) and the return on investment for CP remained virtually unchanged (9.29 per cent vs 9.49 per cent).

The $13.2 million associated with the "non-Prairie" branchline subsidy program could increase substantially in the future because:

a. Subsidies accrue 90 days after application for abandonment (which in itself is not affected by the "moratorium"); once cases are heard and decided, the accrued funds become liable for disbursement. This retroactivity feature applies to all uneconomic branchlines, whether or not abandonment is permitted; and

b. Due to overbuilding of the original railway network, light density lines totalling thousands of miles could also become candidates for abandonment.

Weaknesses in the existing programs are clearly recognized in the proposed revisions to the National Transportation Act (Freedom to Move) and the recently completed CTC "Report of the Inquiry into Railway Branchlines". The former states that "The government proposes to adopt a comprehensive approach to branchline abandonment that will facilitate the development of innovative options for improving transportation services and the continued use of branchlines where feasible". It also recognizes that "under appropriate circumstances, lines other than branchlines may be abandoned"; proposes changes to the process and incorporates time limits. Findings of the CTC Inquiry reinforce these views.

The Newfoundland Railway Testing and Evaluation program is a separate issue. The study team is of the view that the Newfoundland railway is inherently inefficient because traffic volumes are too low for a cost-effective railway operation; and the rail/ ferry/ rail connections involve multiple handlings which lead to greatly increased costs. Moreover, aside from any statutory obligations, there is no real economic or public interest need for continuing the railway service due to the availability of, or potential of, alternate truck and water services. In these circumstances, it has been concluded that the railway should be phased out, thus removing the drain on CN's funds, and eliminating the need for subsidization of the competing (water) mode. Because of the implications for employment and taking into account that the alternate water/ road operation could absorb some 200-300 railway employees, there should be generous assistance in the form of early retirement benefits and retraining for the remaining employees to ease the negative social impact of this labour reduction.

Flowing from the foregoing assessment, the major themes of the study team's review are:

a. Requesting the CTC to resume consideration of applications for branchline abandonments forthwith;

b. Streamlining and accelerating the CTC hearing process with publication of the costs, revenues and traffic moving on specific routes for which abandonment applications are made;

c. Allowing diversion of subsidy funds to the least cost transportation alternative or, in special circumstances, permitting one-time payments to facilitate abandonments;

d. Downsizing the Railway Freight Branch of TC to a core group tasked with advising the minister on issues related to railway freight and grain matters of national importance; and

e. Negotiating the phase out of the Newfoundland Railway with generous provisions for labour and appropriate arrangements with Newfoundland.

Note: This Overview should be read in conjunction with the Grain Transportation Overview.

RAILWAY FREIGHT

DESCRIPTION

The Railway Freight Branch monitors railway freight services and analyzes railway capacity, efficiency, and effectiveness. The branch also conducts studies on a wide range of special topics, including railway electrification, railway access, joint track usage, and environmental concerns.

AUTHORITY

Main Estimates.

OBJECTIVES

To advise the minister on a variety of subjects related to railway transportation.

BENEFICIARIES

National and regional public interest related to overall capacity and economic performance of the Canadian railway system.

EXPENDITURES (84/85)	**($000)**
CAP	-
O&M	3,200
Transfer	200
Total	3,400
Revenue	-
Net Cost	3,400
Person-years	28

Note: Person-years and costs of this program are allocated to a wide variety of activities including: grain-related transportation studies; railway electrification studies and demonstration programs; analysis of joint track usage; and policy analysis. Some of these activities might properly be considered as transportation research.

OBSERVATIONS

Representatives of both major railways seriously question both the level of effort in terms of PYs and the appropriateness of a federal government program that deals with matters for which the railways themselves have full responsibility.

Program managers believe that the strategic planning activities related to railway capacity, systems and finances (CN) provide information that is necessary for effective policy development.

The railway electrification project was cited by railway representatives as a typical example of a major program that has few benefits to the railways. The same comment applied to studies related to joint track usage. However, many other parties with a legitimate interest believe it is necessary to maintain a capability to examine major railway issues from the perspective of broader national and regional concerns.

KEY ISSUES

Should this program be maintained at the present level, reduced in scope, or eliminated?

ASSESSMENT

Although railway planning is primarily the responsibility of the railways, federally regulated railways play a dominant role in Canada's freight transportation system and the largest railway (CN) is a federal Crown corporation. Therefore, a small, capable staff is required within the department to analyze major railway issues and assist the minister in policy development.

In the view of the study team, there appears to be considerable overlap between this program and research activities of the CTC and the Transportation Development Centre.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Reduce Transport Canada's resources devoted to this program to a core group of 8 - 12 professional and support staff to advise the minister on various railway freight and grain issues of regional or national significance. (See also Grain Transportation.)

2. In addition to the staff resources needed for the core group, provide for a sufficient Transport Canada budget to engage private sector consultants for specific, non-recurring studies.

RAIL BRANCHLINE SUBSIDIES

DESCRIPTION

Payments by the Canadian Transport Commission (CTC) of 100 per cent of the operating losses incurred by railways in operating uneconomic "non-prairie" branchlines until such time as discontinuance is approved. (Non-Prairie branchlines are defined as lines over which export grain constitutes less than 60 per cent of traffic by volume.)

AUTHORITY

Section 256 of The Railway Act.

OBJECTIVE

To compensate the railways for losses incurred on uneconomic freight services that are provided as an imposed public duty on designated branchlines.

BENEFICIARIES

Shippers - the availability of rail service.

Railways - elimination of operating losses on uneconomic branchline services which are deemed, by the CTC, to be in the public interest.

EXPENDITURES (85/86)	**($000)**
CAP	-
O&M	192
Transfer	13,120
Total	13,312
Revenue	-
Net Cost	13,312
Person-years	5

Notes: Railways are eligible for subsidy beginning 90 days after application until abandonment is approved. If abandonment of an uneconomic service (as verified by the CTC) is disallowed, eligibility for subsidization remains in force for a period of 5 years, subject to review at that time.

Railway compensation excludes contribution to fixed costs, provision for new capital, or accrued interest on eligible losses during the CTC decision process.

The subsidy shown for the year represents sums only for those lines where continuation of service has been ordered by the CTC. Many other applications are pending which exposes the government to further payments even where requests for abandonment are approved.

OBSERVATIONS

When a railway considers that continued service on any branchline is commercially unattractive, it can make an application to the CTC to abandon the line. Commencing 90 days from the date of application for abandonment, the railway is eligible to receive a subsidy for any line the CTC determines to be uneconomic. If the application for abandonment is disallowed by the CTC, the railway must continue operating the branchline under subsidy. A line's eligibility for continued subsidy is reviewed after 5 years.

In response to a request by the Minister of Transport in December, 1984, the CTC has held in abeyance virtually all applications for branchline abandonments that were in process or that were received. This has been termed a "moratorium" by the industry although this is not strictly correct. Among other things, this failure to consider applications for branchline abandonment has the effect of increasing government liability for future subsidy payments because, as noted earlier, eligibility for subsidy commences 90 days after the application is received by the CTC.

Most interventions opposing abandonment applications appear to be socially motivated but they often carry more weight than economic considerations.

Application by either railway for abandonment of uneconomic branchline can be a lengthy process, lasting in some cases up to 4 years. Since the railways are eligible for subsidies 90 days after application, a CTC order to abandon service can involve substantial payments to the railways for losses incurred during the decision-making process.

Subsidies paid to the railways for uneconomic branchline service often bear little relationship to the traffic involved. In one case, an annual subsidy of $1 million has been paid for a branchline on which as few as three cars moved. In another case, a small subsidy has been paid to maintain the line even though no traffic moved over the line.

In applying for abandonment, the onus rests on the railways to demonstrate the availability of alternative services to affected shippers. For this purpose, the CTC relies heavily on submissions made during the hearing.

In many cases, traffic conditions that may have influenced a CTC decision to order continuation of service have changed considerably, with the result that excessive subsidies are paid to support a service for which there is little or no demand. Other than on a 5-year review basis, there is no flexibility to alter the CTC order in accordance with changing demand.

For some uneconomic services, deferred maintenance often leads to further traffic reductions, and the act of filing the application erodes shipper confidence in the future of the line.

As a consequence of the current deregulatory environment, there are many potential light density and branchline services for which abandonment applications will be made.

In most cases, highway transport represents the most economic alternative to uneconomic railway branchlines. However, the CTC subsidy program cannot be applied to support trucking service.

Another possible substitute for a subsidized branchline by a major railroad would be the transfer of operation to an independent, "shortline" operator. For a shortline operator to be successful, the following ingredients are seen to be required: traffic density; traffic diversity; favourable labour agreements; local institutional and industry support; and operational competence.

KEY ISSUES

Should the CTC's consideration of applications for branchline abandonment be resumed?

Could subsidies be used more effectively to provide alternative services, thereby reducing the public cost of transportation?

Should applications to abandon be judged solely on commercial principles?

Could some uneconomic branchlines be operated profitably by selling them off as shortlines?

ASSESSMENT

Under present legislation, subsidies for the continued operation of uneconomic branchlines are mandatory. The current "moratorium" on abandonments and the delays inherent in the CTC hearing and decision making process have needlessly increased public costs.

It is the view of the study team that although decisions on branchline abandonments are influenced by arguments presented during hearings, the magnitude of losses in relation to traffic carried is not well publicized.

In special circumstances, affected shippers could be provided with a one-time financial incentive to facilitate abandonment and thus eliminate the continued need for subsidies.

Branchline subsidies do not adequately compensate the railways for imposed public duties in contrast with the philosophy underlying Freedom to Move.

OPTIONS

See also Rail Branchline Rehabilitation under Grain Transportation.

The study team recommends to the Task Force that the government consider the following:

1. The CTC be directed to resume consideration of branchline abandonments forthwith.
2. The CTC be asked to deal with as many out-standing abandonment applications as possible within 6 months of its resumption of their consideration.

3. The CTC be asked to accelerate the hearing process on branchline abandonments generally, with a suggested maximum time of 6 months within which to publish a decision.

4. The CTC be asked to ensure that, prior to public hearings, it carries out its own assessment of alternative services if the issue is specifically raised by an intervenor directly affected by the proposed abandonment.

5. The CTC be asked to develop a communications strategy to publicize prior to the hearing the costs, revenues, and traffic carried on specific routes for which abandonment applications are made.

6. To the extent railways continue to receive branchline subsidies, loss determinations should be amended to allow a contribution to fixed costs and provision for new investment deemed necessary to the continuation of an essential service.

7. Pursuant to the CTC "Report of the Inquiry into Railway Branchlines", introduce legislative amendments to streamline the process; to permit flexibility in the disbursement of funds so as to allow subsidy diversion to the least cost transportation alternative; and to permit, in special circumstances, payment of a one-time financial incentive to facilitate abandonment.

NEWFOUNDLAND RAILWAY TESTING AND EVALUATION

DESCRIPTION

This program was originally conceived as a 5-year program to reassess the economic viability of the Newfoundland Railway through conversion to a container-based operation which involved capital investment in containers, terminals and handling equipment.

AUTHORITY

Under the Terms of Union (1.31), Newfoundland was guaranteed a "rail" service between Port aux Basques and North Sydney and the Government of Canada assumed ownership of the Newfoundland Railway. By Order-in-Council, Canadian National was directed to operate the Newfoundland Railway. Because the service is ineligible for branchline subsidies, this program was developed by Transport Canada to provide capital and labour assistance as a means of reducing operating losses.

OBJECTIVES

To modernize the Newfoundland Railway through conversion to a fully containerized operation as a means of reducing operating losses and maximizing the economic potential of the system so as to test its economic viability under the most conducive conditions.

To reduce labour costs to the extent possible.

BENEFICIARIES

Shippers - maintenance of low rates, improved quality of service, improved access to the national railway system, modal choice and competition.

Terra Transport (CN) - operating economies and deficit minimization.

Labour - some degree of employment stability (but reduced total employment).

The federal government's support of the uneconomic railway has had a very deleterious impact on the private sector marine mode resulting in the requirement for subsidization, and has been disruptive to the trucking industry.

EXPENDITURES (85/86) ($000)

		CN
CAP	-	-
O&M	40	(35,000)*
Transfer	5,500	-
Total	5,540	(35,000)
Revenue	-	-
Net Cost	5,540	(35,000)
Person-years	1	-

* Estimated.

Notes: The Testing and Evaluation Program commenced in 1980/81 with a TEC of $67 million and was scheduled to expire March 31, 1985. Subsequently, a decision was taken to extend the program through 1985/86 with an additional $5.5 million commitment bringing the TEC to $72.5 million.

As a result of the containerization and modernization programs and the resultant reduction in the labour force, the forecast railway operating deficit has declined such that earlier projections of $70 million have been reduced to $35 million although the actual amount of the deficit has increased from $26 million in 1980 to $35 million in 1984.

The Newfoundland Railway now has approximately 800 employees.

The capitalized value of annual losses is in the order of $400,000 per employee.

CN is seeking an additional $240 million from the federal government over the next 5 years (commencing 1986/87) to continue with labour assistance, to complete the containerization, and to compensate for projected annual deficits.

OBSERVATIONS

The Newfoundland Railway is inherently inefficient because: (a) traffic volumes are too low for a cost-effective railway operation; and (b) the rail/ferry/rail connections involve multiple handlings which lead to much increased costs.

The 1978 Sullivan Commission recommended a decision be taken to phase out railway service in Newfoundland over 10 years and that this decision be reviewed at the end of 5 years. A decision to phase out the railway was not taken and, indeed, the testing and evaluation program was adopted as a final attempt to improve the economics of Newfoundland railway service so that it could continue. It is now about 5 years since the Sullivan Commission reported and thus the timing is appropriate for the review suggested by that Commission.

The containerization and other facets of the modernization program have been successful to the extent that a "cap" has been placed on the deficits. Despite these improvements, rail service continues to be uneconomic given the traffic patterns and density.

Water and truck alternatives have the potential to handle all of the Newfoundland traffic now being carried by rail.

A competing direct water transportation service between St. John's and Montreal is receiving an operating subsidy ($4.5 million in 1984/85 and $2.5 million from April 1, 1985 to December 1, 1985).

Assistance for early retirement benefits, retraining and reassignment significantly eased the negative social impacts of the labour force reductions that have already been made.

The CTC hearing to investigate non-compensatory rail rates could lead to higher mandatory rates and cause major losses in railway traffic to other modes. In this respect, it should be noted that interim rate increases have caused some loss of rail traffic and a corresponding reduction in employment.

The prospect of higher rates has created considerable uncertainty in the minds of shippers and employees as to the future of the railway and has had a significant demoralizing affect on railway labour.

A substantial portion of the capital investment in terminals, equipment and containers can be salvaged and made available for alternate services (road and/or water).

A number of the employees would be retained for the containerized road/water operation. It has been estimated that, in total, substitute road/water operations would provide employment for 200-300. Thus the capitalized value of annual losses (see Notes) is substantially greater than $400,000 per employee.

KEY ISSUES

The fundamental question is whether to continue with or phase out the Newfoundland Railway.

A closely related question is whether to press for negotiations before the current level of uncertainty contributes to increasing labour unrest and preempts federal/provincial agreement on phasing out the railway.

If railway service is maintained, whether to compensate CN for its losses.

If railway service is maintained, whether to continue to subsidize the competing water transportation service provided by Atlantic Container Express (ACE).

ASSESSMENT

In the view of the study team, the program was useful to test the true viability of railway service in Newfoundland and was effectively implemented under the most favourable conditions.

The study team believes that aside from any statutory obligations, there is no real economic or public interest need for continuing the railway service due to the availability of, or potential of, alternate truck and water services.

Major opposition to abandonment derives from employment effects and concerns regarding the competitive environment.

Consistent with national transportation policy, CN should not be required to bear the burden of an imposed public duty.

If railway service is retained and CN is compensated for deficits, losses are likely to increase significantly.

If railway service is retained without compensation to CN, the service will deteriorate and labour reductions without an adequate compensation package will meet with strong opposition from the provincial government and unions. In addition, the losses will add to the CN deficit which will likely contribute to the need for recapitalization of CN.

If railway service is retained, the rates should be allowed to rise and the ACE subsidy should be discontinued in the study team's view.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. By the end of 1985, reach an agreement-in-principle with the Government of Newfoundland to phase out the Newfoundland Railway in an orderly manner.

2. The agreement should make provision for appropriate labour settlements being negotiated with the unions to ensure fair treatment for the personnel affected.

3. Provide guarantees that discontinuance of the Newfoundland Railway will not adversely affect either freight rates or the level of service.

4. Allow the subsidy to ACE to expire on December 31, 1985.

TRANSPORTATION EXPENDITURES FOR ECONOMIC DEVELOPMENT

OVERVIEW

Investment in improved transportation has been a traditional method used by the federal government to stimulate economic development by lowering transport costs and increasing accessibility to markets. This has included a wide range of transportation programs involving roads to resources, freight rate assistance, development railways, ports and airports.

Programs reviewed by the study team related to economic development and peripheral to federal jurisdiction fall into two categories: highways and urban transportation. The highway programs provide financial assistance on a cost-shared basis with the Atlantic provinces.

Urban transportation programs provide financial support for commuter rail services in the Montreal region and limited financial support at approximately $2 per capita annually for railway relocation and grade crossings and for other urban transportation improvements selected by the provincial governments ($35 million in 84/85). With the exception of approximately $5 million available under the Railway Relocation and Crossing Act (RRCA) and some carry-over of previously committed funds, urban transportation programs have now expired.

Although the primary objective of the programs reviewed relates to economic growth, many simply provide financial assistance to provincial, and in some cases, municipal governments and appear to have little impact on economic development. Highway programs, for example, are essentially special appropriations resulting from negotiations between the federal government and individual provinces as subsidiary Economic and Regional Development Agreements (ERDA).

In the case of urban programs, the limited federal government assistance for improvements in urban transportation has generally provided greater social than economic benefits, often substituting federal funds for expenditures that would otherwise have been made by provincial governments. Moreover, in both cases, priorities appear to be influenced more by the preferences of the federal government than by provincial priorities.

In reviewing these programs, two major approaches have been adopted. First, for highway programs, the study team suggests that this type of assistance can be negotiated most effectively as a component of the overall amounts to be made available under specific ERDA agreements. These negotiations should reflect provincial priorities and provide the federal government with more latitude to negotiate trade-offs with respect to other transport and non-transport programs from which the federal government may wish to withdraw.

Second, because there is no well-defined federal role with respect to urban transportation, and because urban transportation is clearly a provincial and local responsibility, it is suggested by the study team that the federal government totally refrain from investments in this area. Similarly, in the case of railway relocation and grade crossings, while there may be a federal role in mediating among the railways and provincial and municipal governments, there is no compelling rationale for federal financial participation since these projects relate primarily to urban development objectives, or improvements in road traffic flow.

TRANSPORTATION EXPENDITURES FOR ECONOMIC DEVELOPMENT - HIGHWAYS

DESCRIPTION

Atlantic Provinces Highway Strengthening: to upgrade links of the primary highway network to permit uniform truck load limits and configurations.

Federal/Provincial Highway Agreements: joint financing of highway improvements to stimulate economic development in New Brunswick and Newfoundland.

Subsidiary Agreements on Transportation Development: joint financing of transportation improvements to stimulate economic development in New Brunswick and Prince Edward Island.

AUTHORITY

Special allocations made by Cabinet from the economic envelope for Economic Regional Development Agreements (ERDAs); and

Special Recovery Capital Projects Program.

OBJECTIVES

To use transportation improvements as a means of stimulating economic development and to achieve uniform highway design standards to facilitate inter-provincial trucking.

BENEFICIARIES

Direct benefits to road users and indirect economic benefits.

EXPENDITURES (84/85) ($000)

	APHS	FPHA	SATD	Total
CAP	-	-	-	-
O&M	173	133	50	356
Transfer	32,060	29,900	8,550	70,510
Total	32,233	30,033	8,600	70,866
Revenue	-	-	-	-
Net Cost	32,233	30,033	8,600	70,866
Person-years	1.5	1.5	-	3

Notes: The three programs are similar in purpose but there are significant differences in the funding mechanisms.

The 75:25 federal/provincial sharing under highway ad hoc agreements will continue with Newfoundland until 1985. A new Transportation Subsidiary Agreement under ERDA provides for $112 million over the next 6 years.

Under a Transportation Subsidiary Agreement of an ERDA signed with Quebec, $85 million have been approved for highway projects over the next five years.

Further highway projects are contained in Transportation Subsidiary Agreements of ERDA's with New Brunswick and Prince Edward Island up to 1989. The cost-sharing is 70:30 in New Brunswick and 50:50 with Prince Edward Island.

OBSERVATIONS

Except in special circumstances (see Northern Roads and Infrastructure and PWC Land Transportation), there is no explicit obligation for federal involvement in highways.

These programs were originally perceived as continuations of programs for the Trans Canada Highway and "Roads to Resources". They are now perceived as stimuli for economic development on a regional basis.

Transport Canada provides funding on a cost-shared basis, leaving the planning, design and construction to the provincial transportation departments.

The programs are clearly regional as opposed to national.

These programs are sometimes used to negotiate 'trade-offs' related to other programs from which the federal government wishes to withdraw.

With respect to ERDAs, currently Transport Canada becomes involved in the program after the basic appropriations for transport projects have been made.

KEY ISSUES

To what extent do these programs really stimulate longer term economic development?

Should these programs be incorporated directly in ERDA agreements without the need for TC involvement?

How can spending on unnecessary projects selected for other reasons be minimized?

Is the balance of support from these programs equitable among provinces?

ASSESSMENT

Highway assistance to selected provinces is a matter of ministerial agreement that is not easily subject to economic evaluation.

The economic development benefits of many highway improvements, other than the short-term employment effects, become less clear as the primary network is expanded.

In the view of the study team, Transport Canada effectively monitors and administers programs with minimal resources and does provide an overview for the analysis of possible trade-offs with other transport programs.

On the other hand, allocation of all highway programs to Transport Canada would reduce the possibility of trade-offs in other non-transport sectors.

Transport Canada's involvement in negotiations related to transportation sub-agreements under ERDAs occurs too late to affect priorities.

Treatment among provinces in terms of cost-sharing ratios as well as the selection of provinces for assistance does not appear to be based on a rational and consistent set of criteria. Moreover, the overall apportionment of funds seems to be based on historical expenditures rather than on an assessment of competing needs.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Incorporate all highway assistance by the federal government in subsidiary agreements under ERDA's that reflect provincially established priorities for the use of all funds available in a comprehensive manner.

2. Include Transport Canada as an early participant in all federal/provincial ERDA negotiations to identify in a more comprehensive manner possible trade-offs that could involve either or both transport and non-transport programs.

3. Undertake an assessment of transportation needs (both urban and non-urban) in all provinces that are consistent with the objectives of the ERDA program as a basis for establishing, in consultation with the provinces, priorities for transport assistance in support of economic development.

4. A consistent set of criteria based on a defensible rationale should be explicitly stated for the allocation of Economic and Regional Development Agreement Funds to the provinces.

TRANSPORTATION EXPENDITURES FOR ECONOMIC DEVELOPMENT - URBAN

DESCRIPTION

Railway Relocation and Crossing: provides funding to provinces and/or municipalities for railway relocation in urban areas and the elimination of level crossings.

Urban Transportation Assistance Program (UTAP): assists provinces in funding urban transportation improvements and in elimination of level crossings, primarily in urban areas.

Commuter Rail Services (CRS): provides capital assistance for the modernization of commuter rail lines in the Montreal region.

AUTHORITY

Railway Relocation and Crossings Act (RRCA), Financial Administration Act and Treasury Board, and Canada/Quebec Agreement 1981.

OBJECTIVES

To provide limited assistance to municipalities for urban transportation improvements and to the provinces for eliminating level crossings.

BENEFICIARIES

Users of public transit; road and rail users; municipalities.

EXPENDITURES (84/85) ($000)

	RRC	UTAP	CRS	Total
CAP	-	-	-	-
O&M	67	189	-	-
Transfer	16,410	6,356	12,000	34,766
Total	16,477	6,545	12,000	35,022
Revenue	-	-	-	-
Net Cost	16,477	6,545	12,000	35,022
Person-years	1	2	-	3

Notes: The installation of level crossing aids (signals, barriers, etc.) are excluded. (See Railway Safety.)

UTAP, which consolidated funds from the RRCA on a $2 per capita basis over a 6-year period, expired in 1984, although there is some carry-over of unspent funds.

UTAP funds available under the RRCA continue in 1985/86 at approximately $5 million [Some RRCA funds are used for eliminating grade crossings outside urban areas.]

Total federal commitment for commuter rail is $70 million CN's contribution for the Deux Montagnes line provides an additional $10 million. The program was to have ended in 1984 but has been extended to 1986. So far, $33 million has been spent and Quebec has requested an extension to 1989 for the balance.

OBSERVATIONS

There is no federal responsibility for urban transportation. Commuter rail services are specifically excluded from rail subsidies under the National Transportation Act.

CN's deficit on commuter lines rose from $1.2 million in the 1960s to about $15 million in the 1970s. CN's $10 million contribution to modernization was seen as a "buy-out".

Capital assistance for commuter rail in Montreal is tied to the negotiation of operating agreements between the province and the railways. Because these negotiations have not been completed in the timeframe envisaged, the province has requested an extension of the funding period.

The railways have expressed strong reservations about the proposed rail passenger legislation and its applicability to commuter services.

In most road-railway grade separation projects, the railway contribution is small.

Funds currently available under the RRCA (about $5 million) are adequate to fund only one to two projects in any year.

The highest priorities for elimination of grade crossings on the basis of traffic considerations are primarily in Ontario and Quebec.

Annual funds available under UTAP are negligible in relation to the total expenditures made by provincial and municipal governments for urban transportation. In some communities, funds have been used for projects of questionable relevance, such as sidewalk construction.

KEY ISSUES

Should the federal government provide financial assistance for urban transportation and grade crossing elimination?

ASSESSMENT

Federal funding for urban transportation is too limited, relative to total funding, to have any significant impact on improvements in urban transportation.

In many cases, UTAP funds have been used as a substitute for other provincial or municipal funds and have, with the exception of a few Maritime communities, had little impact on improving urban transportation.

Commuter rail services are a matter for negotiation between the railways and appropriate municipal or provincial transit authorities.

Extension of the Canada/Quebec Agreement for commuter rail (without any increase in commitment) should lead to more cost-effective use of resources than would be the case if funds were invested prematurely before final priorities have been established.

Because of the geographical priorities for grade separations, benefits of the RRCA are regional as opposed to national in character.

Assistance to the provinces for urban transportation can be provided more effectively through ERDA agreements that recognize the differences in priorities and needs of the different regions with respect to urban and non urban transport.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Not seeking authority to re-instate the UTAP program.

2. Extending the funding period for Montreal commuter rail in accordance with the Quebec request.

3. Introducing legislation to amend the Railway Relocation and Crossing Act so as to discontinue any federal funding for this purpose and to restrict the federal role to one of final arbitration. Provision for this role as an arbitrator should also be reflected in the revised National Transportation Act.

WATER TRANSPORT ASSISTANCE

OVERVIEW

This Overview covers the programs under which the federal government provides operating subsidies for east coast ferry services ($181.5 million in 1984/85 - see Annex A for details), as well as unconditional grants to the Provinces of British Columbia, Quebec and Newfoundland in support of other ferry services ($19.5 million in 1984/85). Also included is the program for building airstrips along the Labrador coast ($12.9 million in 1985/86), since the rationale for this program was an overall saving to the federal government through elimination of the passenger vessel subsidies for coastal Labrador service.

The subsidization of water transportation services is very costly in absolute terms as well as per unit of traffic (passengers or goods): payments are substantial for services where traffic is relatively sparse (e.g. Labrador coast) and for services with only seasonally high-volume traffic (e.g. Cape Tormentine-Borden, P.E.I.).

The study team believes that two factors in particular have made expenditures higher than they need to be: the absence of cost control, and the low rate of cost recovery.

High costs reflect, among other things, the lack of political will to keep subsidized service levels to the minimum necessary. Service frequency, seasonality, vessel size and so on are all items that need a critical evaluation. The major factors are the peculiar status of CN Marine, the main contractor for the east coast services, which does not provide the company with many incentives for cost effectiveness; the fact that competition between CN Marine and private operators has not been encouraged; and the various regulations regarding crew manning levels and other operational requirements which loom large for a company like CN Marine. When all is said and done, there is, as in the case of railway passenger operations, a strong skepticism about the justification for reported costs.

As to the unconditional grants to provinces of about $20 million for other ferry services, the agreements do not provide for the federal government to influence service levels and hence the federal government has no means or incentive to attack costs.

Compounding these cost pressures has been the typically very low rate of cost recovery for the subsidized services; the approximate overall rate of cost recovery on East coast services is only 20 per cent. When the public is asked to pay only a fraction of the costs incurred, the level of service demanded naturally rises, further fuelling the cost problem.

In summary, the public has been led to expect certain services, with very low fares, no matter how uneconomic and costly these services might be.

The study team believes it is essential to tackle both cost control and cost recovery simultaneously, and proposes some measures to do this: an information campaign to sensitize the public and elected officials to the costs incurred by these services; federal/provincial discussions aimed at ending federal subsidies in certain cases and rationalizing remaining federal subsidies; the establishment of service-specific cost recovery objectives to be achieved by a combination of higher fares and lower costs; etc. Difficult as some of these actions might be, the alternative, in the study team's opinion, is escalating expenditures for a program already costing more than it should.

Part of this challenge will require a rationalization of federal policy in this field which, although superficially well-defined in five categories for subsidy eligibility, is overly-permissive and incorporates certain types of services even when their stated justification is questionable.

The existing support for ferry services also raises basic questions of equity and consistency. Why should this type of assistance be available in the marine mode, when operating subsidies are generally not provided in the air mode? The study team has concluded elsewhere that subsidies should be phased out or substantially reduced in rail passenger services. Is it legitimate for the transportation sector, which is supposed to concentrate on delivering an adequate and efficient system, to be subsidizing tourism to the extent that the cost recovery ratio for the Cape Tormentine-Borden service is 18 per cent, which translates, for example, to a current passenger fare of only $1.90, and only $9.30 for a car with two passengers? (It is interesting to note, for comparison, that the current express bus fare in Ottawa is $1.45.) Why should provincial governments not share, as a matter of course, in water transport subsidies?

The matter of passenger services along the Labrador coast presents a special case. The federal program to build airstrips at 13 communities (total population 4,900), complemented by a provincial operating subsidy to a local airline, was introduced to reduce overall federal expenditures by allowing the more expensive passenger ferry service subsidy to be withdrawn. Transport Canada to date, however, has not followed through with the second step, while the federal government has exacerbated the inconsistency by contracting for a new passenger vessel to serve the Labrador communities. The study team believes that the original program was soundly based and that it is therefore essential to negotiate an end to the Labrador ferry passenger subsidy as quickly as possible.

Practical realities make it likely that significant federal expenditures will remain necessary, at least for some time. But just as the federal government has moved to rationalize rail passenger subsidies, the study team considers it imperative to take similar initiatives in the area of ferry operating subsidies. The proposals in the following profiles represent, in the study team's view, a practical and reasonable step in this direction which would enable annual savings of $80 million or more, while providing a system that more accurately reflects public needs.

WATER TRANSPORT ASSISTANCE

DESCRIPTION

Ferry Services: Subsidies for passenger and freight ferry services between various points on the east coast.

Grants to Provinces in Support of Ferry Services: Grants to British Columbia, Quebec and Newfoundland for certain ferry services.

AUTHORITY

Constitution Act; Orders-in-Council; Federal/provincial agreements.

OBJECTIVES

To defray the costs of ferry services which otherwise would not be offered or would be priced significantly higher. Under a policy adopted by Cabinet in 1976, these services respond to five types of policy objectives:

a. Constitutionally-required services (connecting P.E.I. and Newfoundland to the "mainland");

b. alternates to constitutionally-required services;

c. Newfoundland and Labrador coastal services, (occasionally referred to as "pseudo-constitutional");

d. promotion of special development opportunities; and

e. relief of isolation.

BENEFICIARIES

Travellers, shippers, local residents and the tourist industry in certain parts of the Atlantic Provinces, Quebec and British Columbia, benefit from low-priced ferry services.

EXPENDITURES (84/85)

($000)	Ferry	Grants	Total
CAP	-	-	-
O&M	2,163	-	2,163
Transfers	181,513[1]	19,498[2]	201,011
Total	183,676	19,498	203,174
Revenue	-	-	-
Net Cost	183,676	19,498	203,174
Person-years	26	-	26

Notes:

[1] Transfer payments of $181,513,000 include $168,176,000 to CN Marine and $13,337,000 to private operators, all in support of east coast ferry services.

[2] Transfer payments of $19,498,000 include approximately $14 million to British Columbia, $2.9 million to Quebec and $2.5 million to Newfoundland in support of ferry services administered by these provinces. These grants are indexed to the locally-adjusted Consumer Price Index.

For 1985/86, the total net cost has been estimated at $166.1 million. This decrease is a result of last fall's expenditure reduction exercise and includes the ending of the profit allowance of some $20 million paid by CN Marine to CN, plus a combination of service reductions and revenue increases aimed at saving a further $18 million.

OBSERVATIONS

Federal/Provincial Agreements

The agreements with British Columbia, Quebec and Newfoundland do not allow for any federal influence over level of service, costs, degree of cost recovery, etc.

The agreements with Quebec and Newfoundland were originally for a five-year period, expiring in 1983/84, but have twice been extended by one year and are now due to expire at the end of 1985/86. The agreement with British Columbia is open-ended and thus appears to be in perpetuity;

only the matter of indexing is subject to review every five years, with the next review in 1986/87.

There have been several attempts to end the grants to provinces. Cabinet in 1983, the department in 1984 and, most recently, the Study Team on Services and Subsidies to Business have all proposed that the Quebec and Newfoundland agreements should not be renewed (a negotiated buy-out was proposed by some, even though there is no obligation to do so). The Business Study Team also suggested that the federal government attempt to end the B.C. agreement (which, unlike the other two, has no expiry date) by offering a buy-out as well as offsets.

Quebec and Newfoundland apparently have indicated no interest in a buy-out, maintaining that their agreements implicitly suggest ongoing assistance and requesting instead that the subsidy be increased. B.C. reportedly prefers a subsidy in perpetuity to a buy-out, and believes that its ferry services are under-subsidized compared to east coast services. The department is discussing the future of the agreements with Quebec and Newfoundland, as these are scheduled to expire at the end of 1985/86.

East Coast Services

As to the contracted east coast ferry services (see Annex A), the cost-recovery rate for CN Marine (the main contractor) is less than 20 per cent, including a rate of about seven per cent on the Newfoundland and Labrador coastal services. CN Marine services linking Nova Scotia with New Brunswick and Maine are exceptional in recovering 40 per cent to 50 per cent of their costs; none of the remaining CN Marine services recovers more than 26 per cent. Of the four private operator services, three have cost recovery rates between 32 per cent and 49 per cent while the other is only four per cent (Placentia Bay).

A comprehensive audit of CN Marine suggested that:

a. the company has few incentives to reduce costs and consequently devotes little effort towards cost reduction; and

b. the company has little or no autonomy in matters relating to routes served, equipment used, level of employment, level of service or fares.

Newfoundland is particularly concerned that a detailed cost accounting has not been available from CN Marine.

The Study Team on Services and Subsidies to Business reviewed CN Marine and proposed that Transport Canada continue to pursue rationalization and cost control. That team also concluded, with respect to ferry services generally, that uneconomic services (such as rail ferries) should be eliminated and that existing service levels should be reduced where they do not make any economic sense.

Constitutionally Required Services

Subsidies for the two constitutionally-required services are approximately as follows (1984): (a) Borden (P.E.I.)-Cape Tormentine (N.B.): $33 million (of which some $3 million is for the "rail" component); (b) North Sydney to Port aux Basques: $67 million (of which $21 million is for "rail"). According to CN Marine, even the on-board amenities (e.g. food) are not priced to recover their costs.

The Canadian Transport Commission ruled in 1983 that the CN Rail service to Newfoundland, which relies upon the North Sydney-Port aux Basques ferry, was setting freight rates below variable costs. The federal government subsequently restored operating subsidies to a competing, private marine service (estimated 1984/85 subsidy: $3.5 million), pending final resolution of the issue. Thus, two competing freight services from mainland Canada are being subsidized, which is inefficient, while a third (out of Halifax) is not, which is inequitable. (See also Newfoundland Railway Testing and Evaluation.)

It should be noted that, in the case of the P.E.I. service, the federal government appears to have maintained that it is not obliged to subsidize the non-rail operating costs of the service, but only to provide the service. The current fare for transporting an adult on this service is $1.90, and for a car plus two passengers is $9.30.

There are two proposals to build a fixed crossing between Borden and Cape Tormentine; one for a rail tunnel, at $400 million to $500 million, and the other for a causeway.

Alternates to Constitutional Services

The alternates to the above two constitutionally-required services are summer-only services between Wood Islands (P.E.I.) and Caribou (Nova Scotia), and between North Sydney and Argentia. When the Borden-Cape Tormentine service was shut down by a strike in 1973, the Courts rejected the federal argument that the summer-only alternate service was a constitutionally acceptable substitute. The rationale for subsidizing this service, i.e. it is needed to provide a back-up for meeting constitutional obligations, therefore appears very doubtful. It would appear that the alternate Newfoundland service should be viewed similarly although it should be noted that the department has attempted unsuccessfully to end the North Sydney-Argentia subsidy.

Newfoundland/Labrador Coastal Services

The services along the Labrador coast and the south coast of Newfoundland required 1984 subsidies of approximately $25 million and $10 million, respectively. While the Terms of Union in 1949 called for the federal government to assume responsibility for these coastal services, it is not clear whether or not this implied a permanent commitment to maintain them. These are sometimes cited as "pseudo-constitutional" services.

Transport Canada has been able to achieve modest savings on these routes by reducing service. In addition, sporadic discussions have been held with Newfoundland about the possibility of the province taking over responsibility for the south coast services. As indicated in the profile for the Coastal Labrador Airstrips program, the Surface Administration believes that one passenger vessel is permanently needed because the marine passenger service has become part of the social fabric of that region. The Surface Administration is also proposing new freight vessels for the Labrador coast that would each have capacity for 12 passengers, largely for the same social reason.

Relief of Isolation

New Brunswick now contributes 92 per cent of the total subsidy for the service between Black's Harbour and Grand Manan. The 20-year federal commitment for a fixed contribution ($259,000) to this service expires this fall.

Special Development Opportunities

Nova Scotia has agreed to cover a portion of the costs of the winter portion of the Yarmouth-Bar Harbour service, while the department has tried unsuccessfully to at least reduce the Yarmouth-Bar Harbour service to summer only.

Fare Increases

Transport Canada had east coast fares raised as of April 1, 1985 to produce revenue increases of 15 per cent, and hopes to continue in this vein. Between 1980 and 1985, revenue increases compounding to 82 per cent were instituted (for comparison, the national CPI during this period rose by 43 per cent).

KEY ISSUES

Is the federal government in fact obliged to subsidize the P.E.I. and Newfoundland constitutional services?

Are the Newfoundland and Labrador coastal services constitutionally required?

Is it legitimate for ferry services to receive direct operating subsidies, when the air mode generally does not and the study team has concluded elsewhere that operating subsidies for rail passenger service should be phased out or reduced substantially?

If retained, should these coastal services be cost-shared with the provinces?

Should cost-recovery objectives be set for each service, as the federal government has done in the case of VIA?

To reduce costs, should the federal government offer subsidized services for tender, allowing private sector carriers to compete with CN Marine?

Given that the Courts have indicated that alternates to constitutional services may not be acceptable, why should alternate services continue to be subsidized?

Can it be demonstrated that the subsidies paid to support "special development" opportunities (the two

Nova Scotia services) have actually enabled opportunities which otherwise would not have occurred?

Consistent with the rationale for the federal involvement in the construction of coastal Labrador airstrips, should subsidies be ended for all Labrador passenger vessels?

ASSESSMENT

Under the present approach, subsidies are substantial and will likely continue to escalate. Low user charges have artifically inflated public expectations, which are fuelled further by the lack of public awareness of the costs incurred to provide the service.

In general, the study team believes that services should be adjusted to reduce costs, costs should be controlled with more vigour, users should pay a greater portion of the costs, and provinces should share the burden of remaining subsidies.

Clarification is needed of precise constitutional obligations on the level of subsidy for the constitutional services, and on the provision of the Newfoundland/Labrador coastal services, to determine the federal government's leeway in taking action to reduce costs and increase revenues.

There are no persuasive policy grounds for continuing to support either the "alternates" to constitutional services or the "special development" services.

Greater consistency with subsidy policy in other modes seems desirable, to minimize inter-modal distortions.

Consistent with the rationale for the Coastal Labrador Airstrips Program, it would seem proper to discontinue subsidies for passenger vessels in that service.

In the view of the study team, the Quebec and Newfoundland grant agreements should be allowed to expire at the end of 1985/86, with no buy-out unless legally required.

In the case of the B.C. grant agreement, the indexing provision should be examined at the next opportunity (1986/87). In the interim, the study team believes it should be determined conclusively whether a buy-out, which may be very expensive initially but cheaper in the long run, is a possibility for reducing or ending the subsidy.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. To assist elected officials in promoting constructive public debate on subsidized ferry services, publish facts on operating costs, revenues and ridership, by sector and by segment, on a semi-annual basis. In support of this, CN Marine should furnish, on a timely basis, cost accounting data which clearly identify these operating costs and their components.

2. Commence negotiations immediately with Quebec and Newfoundland to arrange for a cessation of the federal grants to those provinces and to rationalize all remaining subsidized services so as to maximize cost effectiveness.

3. Commence negotiations with Prince Edward Island and Newfoundland to end federal subsidies for the "alternates" to constitutional services.

4. Negotiate a transfer to Nova Scotia of the responsibility for the "special development" services.

5. Tender subsidized services on an extended basis (e.g. five years or 10 years) which would encourage competitive bidding.

6. Consistent with the Coastal Labrador Airstrips Program Profile, negotiate the termination of subsidies for passenger vessel services along the Labrador coast.

7. Require the CN-operated freight service between mainland Canada and Newfoundland to charge commercially viable rates and end the offsetting subsidy to a private marine competitor.

8. Subject subsidies for the remaining categories of service (i.e. constitutional, Newfoundland/Labrador coastal and relief of isolation) to the following principles:

    a. Establish cost-recovery objectives for each category of service. These objectives should be met by phasing in, over a five-year period, a combination of higher fares and lower costs, the balance between which should be set in consultation with affected provinces. For the constitutional services, 40 per cent seems an appropriate cost-recovery requirement, this being the objective set by the government for VIA's regional routes.

b. Pursue opportunities for further expenditure reduction in connection with proposals outlined below.

Without prejudicing the foregoing:

9. Initiate negotiations with British Columbia to pursue the possibility of ending the subsidy through a buy-out. As a supplemental measure, the option of removing the indexing clause could be pursued.

10. As a priority, seek judicial clarification on federal constitutional obligations concerning:

    a. Subsidy of the constitutional services to P.E.I. and Newfoundland, and

    b. Provision of the Newfoundland/Labrador coastal services,

    in light of which further possibilities to reduce subsidies could be pursued.

ANNEX A

WATER TRANSPORT ASSISTANCE
Routes, Subsidies and Traffic Levels

Route	1984 Subsidy* ($000)	Cost Recovery** (%)	1983 Traffic Passengers ('000)	1983 Traffic Tons ('000)	1983 Traffic Comm.Units ('000)
(1) Constitutionally required:					
North Sydney - Port aux Basques	66,379	21	284	388	41.5
Borden - Cape Tormentine	36,004	18	1,566	295	102.5
(2) Alternates to constitutional services:					
North Sydney - Argentia	7,500	26	33	-	0.1
Caribou-Wood Islands***	6,690	32	496	-	31.3
(3) Newfoundland/Labrador Coastal:					
Newfoundland/ Labrador Coastal	35,735	7	52	62	0.2
(4) Relief of isolation:					
St. Barbe - Blanc Sablon***	1,200	38	31	-	1.8
Placentia Bay***	490	4	2	-	-
Black's Harbour - Grand Manan****	259	69	80	-	3.6
Souris - Magdalen Islands***	2,328	49	43	-	4.1
(5) Special development opportunities:					
Digby - Saint John	7,601	41	242	-	22.2
Yarmouth - Bar Harbour	8,581	50	128	-	4.7
TOTAL:	172,767		2,957	745	212.0

* Calendar year, unless otherwise indicated.

** Percentage rate of cost-recovery; the subsidy provides the balance of funds.

*** Private operator; these expenditures are for the 1984/85 fiscal year. Remaining services are operated by CN Marine.

**** Operated by Coastal Transport, a subsidiary of CN Marine; expenditure is for 1984/85.

N.B. This table lists the ongoing route subsidies under TC-73, and as such covers the vast majority of program transfer payments, but not all. An additional "temporary" operating subsidy of $3.5 M in 1984/85 was paid to a marine freight service to Newfoundland, competing against CN Rail, and there was also a 1984/85 expenditure of $6 M to CN for the purchase of shares in CN Marine.

TC-210: 1984/85 Grants to Provinces

Grant to British Columbia:	$14,380,000
Grant to Quebec:	$ 2,873,000
Grant to Newfoundland:	$ 2,247,000
TOTAL:	$19,500,000

Source: Transport Canada, A Report on the Program Evaluation of Water Transportation Assistance (May 1984), pp. 23-25.

COASTAL LABRADOR AIRSTRIP PROGRAM

DESCRIPTION

Coastal Labrador Airstrip Program: Provides airports in selected communities along the coast of Labrador to enable these communities to be served by aircraft on a regular basis. The federal government contributes 100 per cent of the actual direct construction costs of the aviation facilities, as well as owning and maintaining enroute navigation aids. Newfoundland is responsible for owning, managing, operating and maintaining the airstrip facilities, including the terminal navigation beacons.

AUTHORITY

The Labrador Airstrip Agreement between Canada and the Province of Newfoundland (July 1982).

OBJECTIVE

To facilitate year-round transport services by wheeled aircraft to coastal Labrador communities as a reasonable alternative to the heavily subsidized marine passenger service.

BENEFICIARIES

The infrastructure improvements make possible regular air service to 13 coastal Labrador communities on a year-round basis, to the benefit of the air carrier, Labrador Airways Ltd. and the communities. The population of the smallest and largest communities served are 100 and 935 respectively and the total population of the 13 communities is estimated to be 4,900.

EXPENDITURES (85/86)	**($000)**
CAP	-
O&M	35
Transfer	12,900
Total	12,935
Revenue	-
Net Cost	12,935
Person-years	1

Notes: Construction of the airstrips program is almost completed at a TEC of $44 million (1981 TEC of $50.8 million included $3.8 million for Red Bay, a site which was ultimately deleted from the program).

Consideration is being given to extending the Agreement to include Williams Harbour, a community of 100 people, partly because of the apparent "surplus", and partly because of a need identified in the federal government's Labrador Area Aviation Master Plan, at a TEC of $4.1 million.

Commencing in 1987/88, the federal government is responsible under the federal/provincial agreement for a continuing restoration program to maintain the operational capability of the airstrips. It is estimated that the cost of this restoration program will be in the order of $500,000 per annum, but there is no limit stated in the agreement.

The Government of Newfoundland pays a private air carrier a subsidy equal to the difference in the cost of providing the air service and the revenue received, plus a consideration for profit. This subsidy is now in excess of $1 million annually. (The previous annual subsidy for ski and float operations was approximately $400,000.) In addition, the province is responsible for the ongoing maintenance of the airstrips.

OBSERVATIONS

A number of studies in the late 1970s, some done by or on behalf of the Air Administration and some done by or on behalf of the Surface Administration, advanced a rationale for investment in airstrips to improve the safety and reliability of air service to all coastal Labrador communities with a total resident population of 100 or more as an alternative to the continued subsidization of marine passenger service. It was concluded that, in spite of the heavy capital investment in air infrastructure that would be required, the total cost to the federal government would be lower because of the savings in the marine passenger service subsidy. Thus, the plan that was the basis for the agreement between Canada and the Province of Newfoundland designated air as the primary mode of passenger transport supplemented during the marine season by a small (12) passenger capability on coastal freighter vessels.

The airstrip program is almost complete and 10 communities now receive regular air service. Air passenger traffic is increasing as the airstrips are completed, but a more gradual change in 'transfer to air' travel is foreseen as long as the marine service ticket cost remains significantly lower than the air ticket cost. In this respect, it should be noted that the marine service recovers only six per cent to seven per cent of its operating cost.

It seems apparent that passengers will continue to use the marine passenger service so long as it is available, partly because they cannot afford or are not prepared to pay air fares that are significantly higher than marine fares, and partly because they value the marine service as a form of travel which is very much part of the traditional fabric of the coastal Labrador lifestyle.

Although Transport Canada has advised that the $25 million annual payment to CN Marine for subsidization of the marine coastal services cannot be divided into freight and passenger service costs with any degree of accuracy, it is estimated that an annual saving in the order of $10 million would be achieved if the marine passenger service were eliminated and only the marine freighter service were subsidized.

Assuming that the current ticket cost differential will continue indefinitely, CN Marine consultants concluded that one passenger ship and three freighters with 12-passenger capacity would be necessary through the period 1986 to 2000 to handle all marine passenger traffic (north and south of Goose Bay) during the marine season (June to December).

Subsequently, consultants for Transport Canada and CN Marine recommended that a new passenger vessel be acquired and in service by 1986, designed to provide Labrador coastal service over the June/December period and Newfoundland south coast service in the winter with 130-passenger capacity and 15,000 cubic feet of chiller and freezer cargo space. Treasury Board has given CN Marine permission to acquire this vessel for delivery in 1986. The vessel is being built at Port Weller, Ontario at a cost of

$21 million, the lowest domestic bid (a Norwegian ship yard submitted a bid of $17 million).

Labrador Airways is opposed to the building of a new ship and had suggested to the federal government that there was no need for CN Marine passenger services in competition with its existing air services on either the north or the south coasts of Labrador. Indeed, in 1984, Labrador Airways Ltd. submitted a proposal to have the federal government subsidize the operation of two DASH-7 aircraft along the Labrador coast to improve the air service to these communities and thus further reduce any need for marine passenger service. The Air Administration of Transport Canada was of the opinion that substituting a federally subsidized air service for marine passenger services would only make financial sense (in that it would reduce the burden on the federal government) if the marine passenger services ceased altogether and certain conditions applied, viz:

a. The marine passenger services were replaced by a two DASH-7 service in summer and a one DASH-7 operation in winter;

b. The population affected agreed to pay for air fares that are somewhat higher than the present marine fares in summer and the same as present air fares in winter;

c. The demand for passenger transportation was not affected by the higher fares; and

d. The capital costs of the second DASH-7 were offloaded, pro rata, on some other service in winter.

The Air Administration observed that the proposal envisaged air service to all communities six days per week in the summer and three days per week in the winter (the latter being the same as now). This capacity could handle the entire passenger demand now accommodated by the marine services, plus improve the air cargo capacity of the carrier.

KEY ISSUES

Are adequate mechanisms in place in Transport Canada and in the federal government to ensure that savings are realized from federal/provincial agreements that involve inter-modal trade-offs?

What steps, if any, should be taken to substitute subsidized air passenger services for subsidized marine passenger services?

ASSESSMENT

Now that the airstrips have been built and Labrador Airways Ltd. have achieved a good level of service (five flights a week in the summer and three flights a week in the winter) using Twin Otters, the study team believes it would be reasonable for the federal government to cease subsidizing the coastal Labrador marine passenger service. Despite the federal/provincial arrangements made to discuss Newfoundland transport issues, there appears to have been no effort made by Transport Canada to obtain provincial concurrence to the elimination of the subsidy, notwithstanding the provision for such action in the July 1982 agreement. Indeed, in spite of the rationale for the Labrador airstrip program and the subsequent Labrador Airways DASH-7 proposal, the federal government has contracted for a new vessel for a marine passenger service.

With respect to the contract with CN Marine, the new ship's lease agreement includes purchase options at selected intervals. In light of the terms of the contract and Transport Canada's failure to implement the plan for modal substitution, the study team suggests the department find the necessary capital funds to permit CN Marine to purchase the ship at the earliest opportunity. This would mean in essence a $21 million capital expenditure in 1986 as opposed to $3 million annually for 20 years.

Note: This profile should be read in conjunction with the profile on Water Transport Assistance.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Consultation with appropriate ministers in the Government of Newfoundland and Labrador with a view to early elimination of the coastal Labrador marine passenger service subsidy as envisaged by the 1982 agreement.

2. Have CN Marine exercise the option to buy rather than lease the new passenger vessel under construction using funds from within Transport Canada's Reference Level.

3. Examine CN Marine's passenger service requirements and to report to the minister on alternative uses for the new vessel so that the government can consider the future role, if any, of this vessel in meeting east coast ferry service needs.

4. Make no commitment to provide direct operating subsidies for coastal Labrador air service unless and until the principles of economic regulatory reform as outlined in Freedom to Move have been legislatively adopted and only if the subsidization would be consistent with these principles.

FEDERAL HIGHWAYS, BRIDGES, LOCKS AND DAMS

OVERVIEW

The federal goverment has a number of programs involving federal highways, bridges, locks and dams, delivered through departments such as Public Works and Indian Affairs and Northern Development.

Highway programs fall into two basic categories. First, the federal government is involved in programs for the construction, reconstruction, and maintenance of roads in Yukon and the Northwest Territories which derive from historical responsibilities. Second, the federal government is involved in maintenance and reconstruction of some sections of highways in the provinces, such as the Trans Canada Highway through Banff National Park.

Some bridge programs are the result of historical responsibilities related to the St. Lawrence Seaway, are railway bridges that serve public vehicular traffic, or provide international connections. Federal involvement in locks and dams also evolved historically from a time when certain waterways were used for economic purposes such as the transportation of forest products.

In the case of highway programs for Yukon and the Northwest Territories, federal involvement was precipitated initially by a desire to assist in achieving defined regional economic and social development goals. Often, however, federal and territorial governments were not entirely in agreement with respect to highway priorities with the result that the federal government gradually diminished its involvement as the territorial governments were able to take on more responsibility. During 1980 and 1981, for example, Yukon and the Northwest Territories assumed responsibility for maintenance work, and Yukon for the reconstruction of intra-territorial roads. Negotiations are currently underway for both territorial governments to assume all remaining responsibilities for road works.

In the case of highways and other than international bridges, and leaving aside ownership, there is little rationale for continued federal involvement in an area that clearly falls under provincial jurisdiction. The improved flow of traffic and enhanced economic and social development that federal highways and bridges provide are identical to the benefits that provincial and municipal ownership of similar infrastructure bring.

The study team believes that where the provinces are unwilling to assume ownership and control of the bridges, there is little reason why bridges should not be operated on a full cost recovery basis, since users are clearly identifiable. A policy of financial self-sufficiency would have the effect of eliminating federal government expenditures on bridges and place the financial burden for the use of bridges directly on the beneficiaries. It should be noted, however, that attempts to impose or raise tolls in the past have met stiff opposition.

It is the view of the study team that with respect to international bridges, the federal government should focus on financial self-sufficiency.

Similar to the situation for highways and bridges, the responsibility for marine locks and dams could be assumed by the provincial governments.

Within this framework, the major themes of the study team's assessment are that:

a. The federal government should adopt as a policy objective the devolution of federal responsibilities in highways, bridges, locks and dams located in provinces;

b. The Federal/Provincial Relations Office should be tasked to develop, in consultation with Treasury Board Canada and program departments, devolution strategies which identify these infrastructure as potential trade-offs in all negotiations; and

c. In the case of northern highways, given that Yukon and the Northwest Territories have already assumed some responsibilities and are interested in completing the take-over, a federal/territorial transfer of the total responsibility, with the associated funding, should be concluded as early as possible.

PWC LAND TRANSPORTATION PROGRAM - HIGHWAYS

DESCRIPTION

Construction, reconstruction and maintenance of designated highways including portions of the Trans Canada Highway within national parks.

AUTHORITY

Public Works Act (S.9 and S.12) and the Trans Canada Highway Act (S.8).

OBJECTIVES

To improve those components of the national highway system that are the responsibility of the federal government.

BENEFICIARIES

Users of the Alaska Highway, the Haines Road, and the Trans-Canada Highway through national parks.

EXPENDITURES (84/85)

($000)	National Parks	Northwest Highway System	Total
CAP	28,700	28,043	56,743
O&M	-	23,922	23,922
Transfers	-	-	-
Total	28,700	51,965	80,665
Revenue	-	-	-
Net Cost	28,700	51,965	80,665
Person-years			54*

* There are 119 person-years overall involved in this activity but only 54 are allocated to capital projects. They have not been divided between the two programs.

OBSERVATIONS

Maintenance of the British Columbia portion of the Alaska Highway is done under commercial contract for Public

Works Canada (PWC). The Yukon portion of the Alaska Highway and the Haines Road are maintained by the territorial government with their own labour force.

Current major activities under this program include 66 kilometres of reconstruction of the Northwest Highway (Alaska Highway and the Haines Road), six kilometres of construction to twin the Banff section of the Trans Canada Highway (TCH), and 2,100 kilometres of maintenance for the Northwest Highway system.

Parks Canada's construction standards exceed most provincial standards because of the environmental concerns in national parks.

All indications are that program expenditures will increase as it is expected that the full 75 kilometres of the Banff section of the TCH will be twinned.

Concerns were expressed in Yukon that the lack of uniform truck load limits along the Alaska highway and the Haines Road within the jurisdictions of British Columbia, Alberta, Alaska and Yukon impose severe economic penalties on shippers and thus on the region. Since truck load limits range from 98,000 pounds in Alaska to 135,000 pounds in Yukon, inter-regional hauls must conform to the lowest limit along the route, imposing inefficiencies and adding costs to the transportation of goods into and out of Yukon.

PWC offers a consulting service in design, construction and reconstruction of federal government highways together with economic analysis and project environmental assessment.

The inter-departmental highway committee has not been an effective instrument of policy for some years.

KEY ISSUES

Should federal highways within provinces be transferred to provincial governments?

Should several departments be involved in highway programs (Transport Canada, Parks Canada, Indian and Northern Affairs Canada, and Public Works Canada) or should federal government effort be consolidated in one department?

Should all federal involvement in highway programs be restricted to transfer payments negotiated between the federal government and the provincial and territorial governments?

ASSESSMENT

The highways unit in PWC grew from the Trans Canada Highway team. In the view of the study team, it is essential for the federal government to retain a nucleus of the engineering expertise that currently exists in that unit for advice in negotiations. However, as PWC is now obliged to charge fees for its services and may move to full revenue dependency, the client departments, DIAND and Parks Canada, must have the option of hiring private sector consultants.

The study team agrees that the ultimate objective of the federal government should be to transfer the custody and control of all federal highways including sections of the Trans Canada Highway through national parks, to the provincial and territorial governments. In the interim, the study team sees no clear case for transferring the responsibilities to any one Department.

PWC is presently negotiating with B.C. for the transfer of the B.C. section of the Alaska Highway to the province and the study team believes this effort should be intensified.

The Study Team on Real Property Management concluded "that the custody and control of the highway system should eventually be transferred from PWC to the provincial governments; in the interim Transport Canada should assume custody and control of all federal highways".

Note: This profile should be read in conjunction with the Northern Roads and Infrastructure profile.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Establish as an objective the transfer of responsibility for all federal government highways to the provinces/territories as quickly as feasible.

2. During the transitional period, a nucleus of the existing highway engineering unit in Public Works Canada (PWC) should be the source of technical expertise in the federal government; the current programs could remain in their respective departments; and PWC could downsize its highway consulting services as a function of the demand.

3. Develop and implement of devolution strategies in which these particular highway programs would be considered potential trade-off items in all areas of federal/provincial and federal/territorial negotiations. The inter-departmental highway committee could be used as a forum for discussion of these matters.

4. Explore the possibility of standardizing truck load limits (at the highest existing levels) among the various jurisdictions involved along the Alaska Highway and Haines Road.

NORTHERN ROADS AND INFRASTRUCTURE

DESCRIPTION

Indian and Northern Affairs (INAC) is responsible for the construction of all new roads in Yukon and the Northwest Territories, and for specific road reconstruction works on the Dempster, North Canol, Carcross, and Mackenzie Highways. The department also monitors the remaining road reconstruction carried out by the Northwest Territories. In its activities, the INAC Northern Roads and Airstrips Division uses the services of the territorial governments and Public Works Canada (PWC).

The Canada/Northwest Territories Reconstruction of Roads Agreement made available to the Government of the Northwest Territories, funds for the reconstruction of intra-territorial roads in the Northwest Territories. The agreement came into effect in 1980 and expired March 31, 1984.

AUTHORITY

Department of Indian Affairs and Northern Development Act, 1970; Yukon Act; Northwest Territories Act; Territorial Land Act; Land Titles Act; Public Lands Grants Act; Canada Land Surveys Act.

OBJECTIVES

To identify and support road development for economic purposes in Yukon and the Northwest Territories.

BENEFICIARIES

The residents of the territories, particularly indigenous peoples and resource-based industries.

EXPENDITURES (84/85)	**($000)**
CAP	21,816
O&M	1,088
Transfers	-
Total	22,904
Revenue	-
Net Cost	22,904
Person-years	9

OBSERVATIONS

INAC and the territories have often disagreed on the priorities for road projects.

In 1980, Yukon assumed responsibility for the maintenance and reconstruction of intra-Yukon roads. Negotiations between INAC officials and Yukon will begin in September 1985 with respect to the transfer of INAC's remaining responsibilities for road works in Yukon.

In recent years, the government of the NWT has sought the transfer of the funds and responsibility for the construction, reconstruction, and maintenance of roads from INAC. In 1981, the NWT became responsible for maintenance work and the reconstruction of intra-territories roads. Negotiations are currently under way for the transfer of the full responsibility for inter-territorial roads and the construction of new NWT roads.

The INAC Northern Roads and Airstrips division has nine person-years (PYs): one engineer plus socio-economic advisors and support staff. The division relies largely upon PWC for the highway engineering expertise required. Sometimes PWC will hire consultants on behalf of INAC although there are no truly territorial consulting firms as firms tend to be branch offices of Edmonton consultants. The division also has recourse to engineering support from INAC Technical Services on questions of roads and airstrip standards.

Representations were made in the NWT about the adverse impact the lack of a bridge over the Mackenzie River at Fort Providence has on the economic development of the NWT.

KEY ISSUES

Should the federal government be involved in road works in the territories?

Does the INAC program encourage native contruction firms' involvement in highway construction?

ASSESSMENT

INAC funding of roads will average $20 million annually until 1988 under a 5-year plan approved by Treasury Board. The contracts are kept below $2 million each so as to encourage native people's construction firms to bid. This has proved successful.

The outcome of the federal government's negotiations with the NWT and Yukon will likely result in the transfer of responsibility for this program, which will allow the territories to establish their own priorities and construction standards.

The Study Team on Real Property Management proposed "that professional and technical expertise should be transferred to PWC. INAC should contract future requirement for these services from PWC. INAC should phase out in-house capital construction of northern road projects and transfer responsibility to the territorial governments by making transfer payments". In the study team's view, there is no need to transfer INAC's technical expertise to PWC, as PWC currently has the expertise and is adequately resourced to take on whatever federal commitment remains after the transfer.

Note: This profile should be read in conjunction with the PWC Land Transportation Program - Highways profile.

OPTIONS

The study team recommends to the Task Force that the government consider:

1. Transferring the responsibility and associated funding for road construction in Yukon and the NWT to the territorial governments.
2. Eliminating the Northern Roads and Airstrips division and the road engineering support in its Technical Services division, and use the expertise currently available in Public Works and Transport Canada.

BRIDGES

DESCRIPTION

Blue Water Bridge
Victoria Jubilee Bridge
Jacques-Cartier and Champlain Bridges
Highway Bridges over Canals
Land Transportation Program - Bridges

Through several departments and programs, the federal government is involved in the construction, administration, control and ownership of bridges. Annex A contains individual program descriptions and associated resources.

AUTHORITY

See Annex A.

OBJECTIVES

To construct, maintain and manage federal bridges.

BENEFICIARIES

Improved access.

EXPENDITURES (84/85)	**($000)**
CAP	1,407
O&M	2,417
Transfers	6,777
Total	10,591
Revenue	-
Net Cost	10,591
Person-years	33

Notes: The Canadian portion of the Blue Water Bridge is financially self-sufficient from toll revenues and does not require subsidies.

A transfer payment of $4.4 million for the Jacques Cartier and Champlain Bridges covers operating deficits. The corporation had revenues of $6.5 million and budgeted capital expenditures of $150,000.

Federal expenditures on bridges under other programs (e.g. in 1985/86, the Air Transportation program will be spending some $3.5 million on the Arthur Laing and Dinsmore bridges at Vancouver airport), departments (e.g. Indian and Northern Affairs) or agencies (e.g. National Capital Commission) were not within the study team's Terms of Reference and therefore are excluded.

OBSERVATIONS

There are 91 bridges in three departments (Transport Canada: four; Environment Canada: 70; and Public Works Canada: 17) included in the present program review. However, other programs (e.g. Air Transportation), federal departments (e.g., Indian and Northern Affairs) and agencies (e.g. the National Capital Commission) are also involved in the custody and control of bridges.

While there may be interdepartmental consultations from time to time as noted below for international bridges, departments/agencies generally look after their own responsibilities as bridges are viewed as "local" in nature.

Ownership of international bridges falls into three categories: those owned by the federal government; those privately owned; and those owned by Public Bridge Authorities. The privately owned Ambassador Bridge connecting Detroit and Windsor has been the subject of litigation since 1981 when the federal government disallowed the sale of the Canadian part of the bridge to a U.S. interest under the provisions of FIRA.

There is an Interdepartmental Committee on International Bridges with the Secretariat located in Transport Canada. The committee encompasses representatives from Transport Canada, the Canadian Transport Commission, Employment and Immigration, External Affairs, Finance, Justice, Privy Council Office, Public Works and Revenue Canada. The committee acts as an advisory body with no formal terms of reference and it only meets when a specific issue emerges.

In the recent negotiations on transportation development, Quebec rejected a federal proposal to include the Champlain and Jacques Cartier Bridges as part of the Economic and Regional Development Agreement.

In 1961/62, in return for the abolition of tolls on the CN-owned Victoria Jubilee Bridge, the federal government agreed to provide a yearly payment of $664,000, as well as to contribute to the maintenance costs of the highway portion of the bridge (about $1.7 million in 1984/85). The agreement with CN is revisited every 10 years and was last reviewed in 1981.

Revenue generation from federal bridges is an area in need of policy determination and concerted implementation effort. Some bridges have tolls while others (the majority) do not. Moreover, where tolls exist, they are generally not adequate to ensure financial self-sufficiency. Increasing tolls on the Champlain Bridge in Quebec to $0.50 from $0.25 would almost make the Jacques Cartier and Champlain bridges financially self-sufficient, while adjusting the tariff on the New Westminster Bridge in B.C. to $4.11 per railway car from $1.95 would cover operating costs.

KEY ISSUES

Should the federal government continue to be involved in the construction, administration, control and ownership of bridges?

ASSESSMENT

In the view of the study team, just like highways which are part of a provincial road network, bridges in general should be a provincial responsibility. As a matter of principle, the federal involvement in the construction, administration, control and ownership of bridges, other than international, should be eliminated.

The lack of a clearly stated objective of strategies to achieve it has meant that the federal government has missed opportunities for devolution or for increased efficiency in program management.

The federal negotiating mandate may need to provide for some form of "buy-out" (e.g. may consist of a one time payment equal to the present discounted value of future maintenance requirements and/or operating subsidies). The opportunities for, and the prospects of, devolution would be heightened if bridges were included as trade-off items in federal-provincial negotiations on matters other than transportation.

In the interim, the federal government could endorse the principle that federal bridges should be made more financially self-sufficient through the following:

a. reducing costs by more contracting-out of maintenance activities;

b. increasing existing tolls to achieve full cost recovery; and

c. adopting the principle of cost recovery where no tolls exist through encouraging and permitting commercial activities on federal bridge property (e.g. "duty free" shops, service stations) as revenue generation measures, introducing tolls, etc.

In reviewing some of these programs, the Study Team on Real Property Management opted devolution to provincial or municipal governments. The study team agrees with the objective but is concerned about implementation because, historically, other levels of government have shown little interest in assuming ownership of federal bridges.

In the view of the study team, there is no particular merit in centralizing the custody and control of all federal bridges under the aegis of Transport Canada as proposed by the Study Team on Real Property Management although the study team does see merit in that department having an inventory of all federal bridges.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Establish as an objective the devolution through negotiation of federal bridges other than those that are international.

2. In the interim, develop action plans aimed at reducing the net cost to the federal government of federal bridges.

3. Use Transport Canada as a focal point for an inventory of all federal bridges and expand the mandate of the Interdepartmental Committee to include all federal bridges.

4. Develop and implement devolution strategies so that bridges will be considered potential trade-off items in federal/provincial negotiations on any matter.

PROGRAM DESCRIPTIONS AND AUTHORITIES

BRIDGES

Blue Water Bridge Authority: Set up in 1964 by the federal government the authority operates the international toll bridge between Point Edward (Ontario) and Port Huron (Michigan). Members of the authority are appointed by the Minister of Transport. There is no federal government funding involved as tolls cover expenses.

Authority: Blue Water Bridge Authority Act, 1964/65, Statutes of Canada, C.6.

Victoria Jubilee Bridge: The program provides payments to CN for the termination of the collection of tolls on the Victoria Jubilee Bridge, as well for annual maintenance and repair costs on the highway portion of the bridge.

TRANSFER = $2,390,000

Authority: Order-in-Council PC 1962-794; Agreement between CN and the Government of Canada dated November 1, 1962 (effective June 1, 1962).

Jacques Cartier and Champlain Bridges: A subsidiary of The St-Lawrence Seaway Authority, the corporation operates and maintains the Jacques Cartier Bridge, the Champlain Bridge (toll) and a portion of the Bonaventure Autoroute in Montreal.

TRANSFER = $4,387,000

Authority: St. Lawrence Seaway Act; Orders-in-Council PC 1978-3129 and PC 1979-1187; Cabinet Decision 336-76-RD; Treasury Board Minute 759687.

Highway Bridges over Canals: Parks Canada is responsible for protecting the historic character and appearance of Heritage Canals (Rideau, Trent-Severn, Carillon, Ste. Anne, Chambly, St. Ours, St. Peters, Sault Ste. Marie and Lachine). Parks Canada's management guideline 5.1.2 Financial Payment Towards Upgrading and Replacing Bridges establishes the financial parameters in respect of some 70 bridges over these heritage canals. These guidelines permit negotiations between Parks Canada and another party for the upgrading and replacement of canal bridges as well as the transfer of ownership. Payments towards bridge construction in lieu of future operating and maintenance responsibilities may also be made.

CAP = $1,384,000

Authority: Historical Sites and Monuments Act, R.S.C. 1970, c.H-6 National parks Act, R.S.C. 1970, c.N.-13.

Bridges: PWC is responsible for the construction, operation and maintenance of designated bridges and related works. (Five international, seven inter-provincial and five intra-provincial bridges.) Three of the intra-provincial bridges have moveable spans that require full-time operating staff.

PYs = 33   CAP = $13,000   O&M = $2,417,000

Authority: Public Works Act (S.9 and S.12); Trans Canada Highway Act (S.8).

PWC MARINE TRANSPORTATION AND RELATED ENGINEERING - LOCKS AND DAMS

DESCRIPTION

Marine Transportation and Related Engineering Locks and Dams: This program provides for the operation and maintenance of lock and dam facilities located on the Ottawa, French and Red rivers.

Marine Transportation and Related Engineering Program Planning and Control: This program provides program planning and control in respect of the above.

AUTHORITY

Public Works Act 9 (1)(a).

OBJECTIVES

To establish, operate, and maintain control dams and locks to regulate and control water levels and flows as required by users for safe and effective navigation and other purposes.

BENEFICIARIES

The benefits include level and flow control of water on the Ottawa, French and Red rivers. The beneficiaries include hydro electric companies and recreational boaters, as well ferry, water taxi, and boat charter operators.

EXPENDITURES 84/85)	**($000)**
CAP	800
O&M	1,400
Transfers	-
Total	2,200
Revenue	-
Net Cost	2,200
Person-years	5*

* The five person-years (PYs) also cover work on dry docks.

OBSERVATIONS

Public Works Canada (PWC) has attempted to divest itself of marine program responsibilities, but without success.

There are current discussions with the province of Quebec concerning the transfer of two dams it currently leases. The lease requires Quebec to pay $1 per year and be responsible for repair and maintenance. Quebec is insisting that the two dams be rebuilt to a higher standard at a cost of $4-6 million before any transfer is agreed to, but has offered to pay half the cost of the upgrading.

KEY ISSUES

Should the federal government continue to be involved in a program whose current benefits accrue to identifiable commercial interests?

ASSESSMENT

The locks and dams in question were built many years ago and part of their original purpose, transportation of forest products, has all but disappeared.

The key identifiable beneficiaries today are Quebec and Ontario Hydro, who in most cases pay nothing for the benefits they receive (the exceptions are the two dams on Lake Kippewa, Quebec, which Hydro Quebec leases and which it operates and maintains at its expense).

The study team supports the conclusion of the Study Team on Real Property Management that the responsibility for the operation of federal locks and dams should be devolved to the appropriate provincial governments.

The potential saving by devolution of these locks and dams is $1.4 million annually in ongoing O&M, and some smaller amount in what seems to be regular capital expenditures for rehabilitation ($0.8 million in 1984/85). As is the case for the two dams on Lake Kippewa, successful disentanglement from this program may require consideration of one-time capital contributions.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Establish as an objective the transfer, through negotiation, of the ownership and operational responsibility of these federal locks and dams to the appropriate provincial governments or their Hydro corporations.
2. In the interim, a method of charging the hydro-electric corporation for the costs to the federal government for the benefits they receive could be developed and implemented so that the locks and dams in that part of the program are completely cost recoverable.
3. Develop devolution strategies, so that these locks and dams will be available for consideration as potential trade-off items in federal/provincial negotiations on any matter.

TRANSPORTATION RESEARCH

OVERVIEW

Because of the importance of transportation to the social and economic development of Canada, the need for research has long been advocated by many individuals and organizations as a means of eventually reducing the cost of transportation and improving accessibility. Compared to the national governments of other industrialized nations, the Government of Canada has, however, devoted relatively limited resources to transportation research.

Although economic and social research related to transportation has traditionally been supported in the form of periodic Royal Commissions or special inquiries, the federal government's formal commitment to transportation research derives from the National Transportation Act of 1967 which established the position of Vice-President (Research) in the CTC and specified the duties and responsibilities of that position.

Since 1967, federal government transportation research has taken three forms. First, with the creation of the CTC, the Research Branch was established and initially embarked upon a broad program of activites encompassing social, economic and technological research.

Second, the CTC itself initiated a program of direct support to Canadian universities involving a combination of development grants, contract research and direct support of post-graduate students. To some extent, the program was designed to stimulate general university interest in transportation research and teaching.

Third, as a result of a reorganization within the Department of Transport in the early 1970s, the Transportation Development Agency (TDA) was established in Montreal as a national transportation research agency to serve the interests of government and industry. Originally, the TDA was considered as an independent administration within the department reporting directly to the deputy minister.

While initially there was some degree of overlap between the programs of the CTC and the TDA, the division of responsibilities that gradually evolved was one in which the CTC restricted its activities to economic and social research while the TDA moved in the direction of technology-oriented research and development. Much of CTC's research is in support of the regulatory activities of the commission, although significant contributions are also made in support of various Transport Canada (TC) responsibilities including policy development.TDA's focus has been more outward in terms of industry needs although, again, many activities are in direct support of TC operating responsibilities.

Despite the original support and enthusiasm that characterized the development of research programs within the CTC and Transport Canada, there has been a continual erosion of the real importance placed on these activities by senior administrators and elected officials. In real terms, for example, the CTC research budget has been reduced to the point where very few funds are available to support contract research. Similarly, TDA was once a quasi-independent organization in control of its own budget and priorities within broad guidelines recommended by private sector advisors. Subsequently, it was changed to the Transportation Development Centre (TDC) reporting at a lower level in TC with the result that much more control over research priorities is exercised by less senior officials.

The product of the CTC research program is highly regarded in some circles and considered by some to be an essential element of national transportation policy development. However, proposals to amend the National Transportation Act in accordance with Freedom to Move suggest that this activity will not be continued in the new regulatory agency.

In contrast, the value of TDC programs has been seriously questioned by many. It is often seen as an agency that disburses funds in accordance with internally perceived priorities as opposed to real market-driven needs. To some extent, it is also seen as a self-perpetuating organization producing solutions in search of problems.

The Transport University Program was transferred from its original home within the CTC to the TDA and subsequently to the strategic planning group of Transport Canada. It is highly regarded by both the private and public sector in terms of both research and the training of transportation professionals, which is particularly impressive in view of its small budget. Recently, however, the minister determined that this program, in its entirety, would be cancelled effective March 31, 1986.

In assessing needs and future directions for federal government transportation research, there are divergent views butthere appears to be consensus on three basic points:

a. There is a large body of opinion which supports the view that research carried out within the strict confines of a bureaucratic structure is of limited value and that, as a result, internal research programs should be disbanded altogether, except in direct support of departmental operating responsibilities.

b. There is substantial agreement on a basic need to undertake truly objective social and economic research on matters of national and regional significance, independently of the internal structure and short-term perspective of Transport Canada.

c. There is also agreement that technological research and development is best handled by the private sector.

Given these views as to the need for federal government involvement in transportation research, the study team's assessment of research programs has the following themes:

a. Research in support of the federal government's operational responsibility in transportation can be carried out more effectively within those administrations responsible for the delivery of specific programs, than by a centralized coordinating group.

b. There is no need for the federal government to support technology development on behalf of the transportation industry.

c. Given the importance of transportation in the Canadian economy, there is a need for independent research to provide an objective evaluation for policy development.

d. The research programs of the federal government should be rationalized to take full advantage of the capabilities of private sector experts and the established research community.

TRANSPORTATION RESEARCH

DESCRIPTION

The Research Branch of the Canadian Transport Commission (CTC) undertakes social and economic research in support of the regulatory activities of the CTC and as part of its mandate to provide the Minister with policy advice.

"Mission oriented" research and development in support of the department's operational, regulatory and procurement objectives is "tasked" by the operating administrations of Transport Canada or other federal government departments. The Transportation Development Centre (TDC) also initiates studies on the advice of industry representatives to facilitate and stimulate investment and innovation throughout the transport sector.

The Transport University Program (TUP) involves three components: fellowships for graduate students, negotiated research contributions for faculty members at Canadian universities, and base level funding for transport research centres at the universities of British Columbia, Manitoba, York-Toronto, Montreal, Dalhousie and New Brunswick.

AUTHORITY

National Transportation Act, Sections 7(4) and 22; Main Estimates.

OBJECTIVES

The basic objectives of these research activities are to improve the information base relevant to the formulation of government policies and to contribute to the development of transport technology appropriate to Canadian conditions. In addition, an increase in the availability of trained professionals for government and industry has traditionally been considered to be an important by-product.

BENEFICIARIES

Government policy and operational programs at the federal and provincial levels; transportation industry; consultants; universities and graduate students.

EXPENDITURES ($000)

	CTC*	TC**	TUP	TOTAL
CAP	3	-	-	3
O&M	4,177	20,451	85	24,713
Transfers	3	79	2,006	2,088
Total	4,183	20,530	2,091	26,804
Revenue	-	-	-	-
Net Cost	4,183	20,530	2,091	26,804
Person-years	69	75	2	146

* Costs are 1985/86 while the remainder are 1984/85. Consequently, the costs are marginally overstated in terms of 1984/85 estimates and marginally understated in terms of 1985/86 estimates. Additional expenditures on transportation research, undertaken by the modal administrations, total about $18 million.

** Approximately 85 per cent of costs relates to the TDC. The minister recently announced the Transport University Program will be cancelled effective 30 March 1986. This includes $79,000 support for the Canadian Institute of Guided Ground Transportation at Queen's University.

OBSERVATIONS

Originally established in the early 1970s as a quasi-independent national research institute reporting directly to the deputy minister, the Transportation Development Centre has undergone numerous reorganizations and now reports to the ADM for Planning and Coordination through the Director General of Research and Development.

Some observers question the likelihood of achieving significant research results within the confines of an operating department.

There is little question of the need for research and development in support of the department's operating programs.

In the case of research initiated by TDC, some believe these activities are essential to stimulate research and development that would not otherwise be undertaken by private industry. Many express the view that much of research and development (R&D) initiated by TDC has no client. Still others believe that because of the proprietary interests of private industry, many of TDC's R&D projects more properly belong totally within the private sector.

Many TDC projects involve cost-sharing with private sector firms where federal funds provide considerable leverage in terms of total expenditures on specific projects. However, there are also a large number of projects involving partnership between the federal government and other governmental or quasi-governmental agencies at the provincial and local level, that fall outside federal government responsibilities.

Some organizations involved in joint ventures with the TDC complain about administrative procedures (generally superimposed by DSS) which reduce the effective use of resources made available for research and which also make it difficult to curtail projects that no longer appear to be beneficial.

Modal advisory committees consisting of government and private industry representatives appear to be an effective means of identifying research priorities for the TDC.

Some TC administrations place considerable importance on the activities of CTC research in support of their own operating responsibilities.

The product of the Transport University Program in terms of both research and trained professionals appears to be highly regarded in both the private and public sector. The university representatives indicate that the Transport University Program is essential for the continued existence of high quality teaching and research programs in transportation.

Other departments and programs not within the terms of reference of the study team, such as the Natural Sciences and Engineering Research Council (NSERC), engage in transport research.

KEY ISSUES

To what extent do TC and CTC research programs involve overlap?

Should broadly-based transport research and development, which is in the national interest, be undertaken by TC?

Should the federal government pursue research in areas of transportation where there is no federal role, such as urban transportation?

Do programs related to product improvements in the equipment field belong with Transport Canada or with the Department of Regional Industrial Expansion (DRIE) or other agencies such as NSERC?

Does cancellation of the Transport University Program unduly limit independent review of issues in the transport sector and adversely affect the capability for training of transport specialists?

Is it realistic to separate technological R&D from socio-economic research and policy development?

ASSESSMENT

In the view of the study team, given the importance of transportation in Canada, there should be a focal point for the examination of significant national and regional issues within an intermodal contextthat cannot be treated by individual companies or agencies. For this reason, there is a need for independent research on policy dealing with transportation matters which transcend the activities of the department.

Given the revised objectives and proposed organization for TC, there appears to be little role for transport research other than in direct support of the department's responsibilities.

R&D which is in the public interest should be, the study team believes, independent of frequent changes in departmental priorities and reorganizations, if long-term credibility is to be achieved.

Technological R&D needs in support of departmental responsibilities can best be handled through the modal administrations.

The study team is of the view that, other than R&D in support of departmental responsibilities, there is no need for TC to be involved in technology-oriented R&D, which is best handled by the private sector in response to market-driven needs or through other industrial development programs such as those offered by DRIE or by research agencies such as NSERC.

There is a need to consolidate and streamline the research activities of the CTC and TC in a manner that retains the recognized capabilities and expertise of the CTC to undertake economic and social research and satisfies the stated needs of the TC administrations.

A significant component of TC's R&D expenditures, including many TDC projects, involve transfer payments to other government and quasi-government agencies for projects which are of questionable relevance to the department's mandate or national research needs.

Experience shows that research organizations within TC eventually become part of the bureaucratic structure and cannot retain long-term independence and objectivity.

Cancellation of the Transport University Program is, in the view of the study team, inconsistent with the advice provided to government from a variety of sources (such as the Ministry of State for Science and Technology) to increase the level of university research funding.

The study team believes that there is a need in industry and within other levels of government for continued independent research and training of specialists in the transportation field.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Disband the Directorate of Research and Development, including the Transportation Development Centre, and eliminate the associated person-years.

2. Each modal administration should be responsible for research in support of its own programs and determine whether its Research Advisory Committees should be maintained.

3. Transfer the social and economic research activities of the CTC that are essential for the policy development activities of Transport Canada, estimated to be about 20 person-years, to Transport Canada.

4. Fund federal government support, which is targeted for private sector R&D, through the industrial development programs of DRIE.

5. Establish an independent federally funded National Transportation Research Advisory Council to be concerned primarily with social and economic research related to transportation matters of national and regional importance (see Annex A).

6. Because of the need for continued independent transportation research, as well as training of specialists for industry and government, the Transport University Program should be reinstated at the 1985/86 funding level.

7. The CTC Research Branch should be disbanded. Person-years in support of the existing modal committees; of Transport Canada including the Research Advisory Council, and of the new regulatory agency envisaged by Freedom to Move should be retained, and the remainder eliminated.

ANNEX A

NATIONAL TRANSPORTATION RESEARCH ADVISORY COUNCIL

As envisaged by the study team:

The council would be comprised of private sector (including labour), provincial and research community representatives appointed by the minister with a small permanent staff (about 15) of highly qualified individuals to provide professional support in the form of a secretariat to the council.

The council would rely on the established research community, including consultants and universities for input to guide its endeavours.

Research priorities would be established by the council in accordance with broad national interests and requests by the Minister, independently of departmental influence or control. An annual budget of approximately $10 million could be reallocated from existing research programs to the council.

The council would undertake a comprehensive review of the transportation research programs of other departments and agencies of the federal government, such as DRIE and NSERC, to avoid unnecessary duplication of research activity and to ensure the maximum dissemination of research findings.

OTHER TRANSPORTATION PROGRAMS

OVERVIEW

In addition to those programs summarized in the preceding overviews, the federal government is involved in a number of programs, both national and regional in scope, that are individually important but do not lend themselves to consolidation because of their program-specific characteristics. These are:

- Transportation of Disabled Persons
- Transportation Training
- Aviation Statistics
- Pilotage
- Sealift
- EMR Small Projects Fund - Transportation

The study team has assessed them in the following stand-alone profiles.

Continuation of federal involvement in providing for accessibility by the disabled, and training for federal employees as well as for others at federal training institutes, raises the need for a horizontal, i.e. across the federal government, assessment because transportation and Transport Canada must be in concert with federally-established policy and guidelines.

Because the output of programs such as Aviation Statistics meets a number of diverse needs, they seem to have grown by "adding-on" rather than making the best use of what is available or essential.

The federal involvement can be questioned to some extent in both the EMR Small Projects Fund and the Sealift.

Pilotage is an example of a national program with a problem in one region.

Nonetheless, in the preparation of these profiles, the following themes have become evident:

a. reduced program scope (Aviation Statistics and EMR Small Projects Fund);

b. reduced federal involvement (Aviation Statistics, Sealift and EMR Small Projects Fund);

c. better coordinated federal involvement (Transportation of the Disabled and Transportation Training); and

d. more cost-effective program delivery (Transportation Training, Aviation Statistics, Pilotage, Sealift and EMR Small Projects Fund).

TRANSPORTATION OF DISABLED PERSONS

DESCRIPTION

This program is to coordinate departmental initiatives/activities to improve transport services for the elderly and the handicapped.

AUTHORITY

Main Estimates.

OBJECTIVES

To fund, promote and/or coordinate initiatives related to improved access to transportation by the handicapped.

BENEFICIARIES

Elderly/handicapped persons are intended to benefit from reasonable and equitable access to transportation services.

EXPENDITURES (84/85)	**($000)**
CAP	-
O&M	578
Transfers	-
Total	578
Revenue	-
Net Cost	578
Person-years	2

Notes: The above data, as reported by the department, are mainly for coordination activities. Funds specifically approved by Cabinet/Treasury Board for the program total $18.6 million over the 8-year period 1983/84 to 1990/91, or on average $2.3 million yearly, and are to be directed primarily towards research and development.

In addition, the modal administrations invest a certain amount of money in improving access to federal property by the disabled. While no precise figures are available, departmental officials estimate that roughly between $3 million and

$4 million a year is spent throughout the department on activities related to the disabled.

OBSERVATIONS

In interviews, managers repeatedly emphasized the fragmented approach which characterizes departmental, as well as overall Public Service activities, in this area.

The broad and vague wording of the 1983 departmental Policy on Transportation of Disabled Persons has yet to be operationalized to acquire any practical meaning for purposes of day-to-day guidance (e.g. no working definition of 'disabled', no precise objectives).

Based on U.S. data, it is estimated that the physically disabled population in Canada includes some one million persons. Of these, 4 per cent require wheelchairs while some 44 per cent either have "minor dysfunctions" or require mobility aids such as canes and crutches.

Despite the critical importance for program management of an adequate grasp of the target clientele, relatively low expenditures are planned to be expended (1985/86 to 1988/89: $325,000) on the development of a reliable data base.

The handicapped community across the country is particularly frustrated by the lack of accessibility consistency across modes and across the country. Short of immediate action by government, some members have threatened to use the litigation route to obtain satisfaction (some cases are already in progress).

Uncontrolled developments in the area of transportation of the handicapped are a definite cause for concern on the part of some members of the transportation industry given their cost implications. Their concerns, however, often fail to distinguish between the impact of judicial decisions (precedent-setting in nature) and those of government (through a program such as that under review).

Other parties have quickly capitalized on the business opportunities arising from the new focus on the handicapped. For instance, as a result of the CN Road-Cruiser Demonstration Project, Winnipeg-based MCI was recently successful in its bid for six specially equipped and 20 regular buses for Boston.

As part of a CTC undertaking to develop an identification card for disabled persons, at least one industry segment (the airlines through the Air Transportation Association of Canada) has come forward with specific criteria for allowing an attendant to travel with the cardholder at half fare. This industry believes it has made noteworthy progress to date, and is concerned that more ambitious proposals do not adequately resolve questions of safety and cost. It would be open to the adoption of broad government rules designed to put some order in the field while being flexible enough to accommodate the many types of carriers.

Representatives of the disabled community agree with the latter principle. They also note that while progress has been made over the last 5 years (particularly in rail), there are many major gaps still to be filled. In this respect, the federal government is seen as having a crucial leadership role, to be exercised even for intra-provincial transportation in spite of acknowledged provincial jurisdiction.

Under the rationale of improved accessibility to the national transportation system and exercising leadership, the federal government is increasingly funding demonstration projects in provincial areas of jurisdiction (e.g. taxis, subways, buses and rural vehicles). Preliminary results from a systematic cross-Canada survey by the CTC indicate that provincial and municipal governments are also becoming more active in these same areas.

Given the nature of the issues, political involvement and interest in the handicapped question is considerable. For instance, a committee was recently created by the minister to develop a broad implementation strategy, to assess new technology and public education, and to provide advice to the minister on these matters. Its 13 members represent a broad spectrum of interest groups. At the officials' level, a federal/provincial committee is now being formed to study initiatives in bus and other motor vehicle transportation, and to promote consistency of access guidelines between different localities.

KEY ISSUES

Given that matters relating to the handicapped cut across many areas of federal activity, and that the equality section of the Charter of Rights has major implications, is it necessary for explicit overall policy to be formulated by the federal government as general guidance before initiatives can sensibly be taken in individual sectors like transport?

Is the cost-effectiveness of current departmental activities optimal?

ASSESSMENT

Issues related to the handicapped have a tendency to quickly evolve into the realm of societal values and choices and therefore, into the political domain. In transportation as well as other areas, these issues raise important questions of social policy with significant potential cost impacts on individual sectors like transport.

Pending the development of a reliable data base together with more operational definitions of the key concepts of the departmental policy on the handicapped, it is not clear to the study team that efforts are being appropriately targeted or that funds are being judiciously spent. Of particular concern is the apparent fragmented approach which characterizes departmental activities in this area, including the lack of a comprehensive cost monitoring and control system. As well, the federal government involvement in areas of provincial jurisdiction is a cause for concern especially when it arises from an exceedingly broad interpretation of what constitutes the national transportation system.

In the view of the study team, the exercise of federal leadership may now need to be more tempered and discriminating so as not to pre-empt or discourage initiatives from other levels of governments, carriers, etc.

Given the diversity of views/interests, it is particularly important that provision be made for broad-based consultation on planned departmental initiatives. While the new committee created by the minister is a move in the right direction, it fails to provide for representation from the provincial governments.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Create a separate study team as an element of the program review to assess all current government activities relating to the handicapped and to advise Ministers on implications, costs, and options for government-wide policy that would guide individual sectors like transport.
2. Unless specifically related to Transport Canada's obligations related to its operational responsibilities, impose a moratorium on all expenditures for demonstration projects pending the outcome of the proposed review.
3. Confirm that, under the overall guidance of the Secretary of State, Transport Canada will play the lead role in matters related to transportation for the disabled.
4. Broaden membership of the Minister of Transport's Committee to include provincial representation.

TRANSPORTATION TRAINING

DESCRIPTION

Transport Canada Training Institute (TCTI)
Canadian Coast Guard College (CCGC)

As part of fulfilling its overall training needs, Transport Canada operates two training centres: one in Cornwall, Ontario (TCTI) and one in Sydney, Nova Scotia (CCGC). TCTI provides technical training for air traffic controllers, marine traffic advisors, electronic technicians and flight service specialists as well as transportation management training. CCGC prepares officer cadets as navigating or engineering officers in the Canadian Coast Guard.

AUTHORITY

Main Estimates.

OBJECTIVES

To contribute to the development of a competent professional, technical and managerial work force to meet operational needs of the national transportation system.

BENEFICIARIES

The beneficiaries are departmental employees - the benefits accrue to the transportation industry and the general public.

EXPENDITURES (84/85) ($000)

	Dept. Coord.	TCTI	CCGC	Total
CAP	-	3,807	7,954	11,761
O&M	2,000	17,391	9,346	28,737
Transfers	-	-	-	-
Total	2,000	21,198	17,300	40,498
Revenue	-	2,732	5	2,737
Net Cost	2,000	18,466	17,295	37,761
% Cost Recovery	-	13	-	7
Person-years	36	281	96	413

Notes: Except for CCGC's capital costs, which have increased because of a $17 million expansion program, all budgetary items have remained relatively stable over the period 1983/84 to 1985/86.

While the foregoing indicates an expenditure of some $40 million, Transport Canada (TC) expends over $70 million in total on training each year. The additional costs are accounted for by training activities within the administrations, mostly in the regions.

OBSERVATIONS

In training, Treasury Board Canada (TBC) sets overall policy and guidelines for departments to follow. Only about 10 per cent of the training needs of the Public Service are fulfilled by the Public Service Commission on behalf of TBC. While TBC guidelines mention cost-effectiveness in training, it is left entirely to departments to determine the nature/extent of relevant tests to be applied in this area. TBC has initiated audits of the extent of compliance by departments to its training guidelines, but it appears not to have articulated evaluative tests.

Transport Canada has a number of unique, specialized training needs (e.g. air traffic controllers). Accordingly, the training budget of the department is about 11 per cent of its salary budget, considerably higher than the government-wide average of 3 per cent. To further illustrate the magnitude of this expenditure, financial data for 1983/84 indicate that at 32 per cent ($70 million) of total training expenditures ($221 million) in the Public Service, TC is by far the greatest single user of funds in this area.

At the same time, significant fluctuations in projected needs have occurred. For instance, based on regional inputs, the estimated need for air traffic controllers has varied as follows: 1982/83: 186; 1983/84: 202; 1984/85: 68; and 1985/86: 70. A similar situation arose in the Marine Administration. Based on the projected need of 110 marine officers yearly by 1989 (from about 35 in 1982/83) the expansion of the CCGC was initiated. Recently, however, the 1989 needs have been revised downward to a yearly requirement of 32. Despite the resulting over-capacity, it has been determined that construction work is now too far advanced to freeze the expansion of the CCGC.

It is estimated that TCTI and CCGC meet about 60 per cent to 65 per cent of the training needs of the department with the remainder met through other sources mainly within the Air and Marine Administrations.

Currently, departmental line managers have primary responsibility for training and development. Indeed, the various directorates within the administrations determine their own needs for training. The Central Training Unit provides functional direction and acts as a service organization as required. Roughly estimated, outside contracts represent about 5 per cent of departmental training costs.

At the initiative of the deputy minister, the departmental Review Directorate has been mandated to undertake a global review of all training within TC. The first phase of the review (Issues Identification) is nearing completion.

The Study Team on Real Property Management has estimated the replacement value of TCTI at $67 million and that of CCGC at $32 million. It has also been estimated that in 1984/85, resources devoted solely to real property management at TCTI and CCGC amounted to a total of about $12.7 million and 26 person-years.

KEY ISSUES

Are the TCTI and CCGC training facilities being utilized effectively and managed efficiently?

Are the training needs of the Department of Transport managed, determined and fulfilled in the most cost-effective manner?

Would privatization, in whole or in part, be a viable option for meeting the training needs of the department?

ASSESSMENT

In the view of the study team, the lack of a concerted/consolidated approach to management of training within TC coupled with minimal reliance on external training services and inadequacies in establishing specific needs of administrations are major causes for concern given their obvious cost implications.

Many inconsistencies and apparent overlaps characterize the departmental approach to training. For instance, cost-recovery practices vary between TCTI and CCGC although both fall under the same responsibility centre.

The decision to review all training activities within TC appears most timely. Given the extent of involvement of all federal departments in training, cost-effectiveness, including value for money considerations, appear to warrant a similar initiative being undertaken across the Public Service the study team believes.

In reviewing CCGC, the Study Team on Real Property Management proposed that charges for foreign nationals be based on full recovery of all operating costs. For TCTI, it proposed that charges be instituted for all users based on full recovery for all operating costs including capital.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Impose identical charging practices within Transport Canada, embodying the principles of full cost recovery, for the use of CCGC and TCTI, in the first instance by non-departmental trainees, and subsequently by charging all managers within the department for the cost of training their staff at the TCTI and CCGC facilities so that ultimately total cost recovery will be achieved.

2. Concurrent with the introduction of the foregoing charging principles, departmental managers should be able to use the lowest cost option, TCTI/CCGC or the PSC or the private sector, for their training needs.

3. Review the operation of TCTI and the CCGC to ensure that costs are in line with those incurred by other training institutes, and to ensure optimum use is made of contracting out.

4. Strengthen the role of the Central Training Unit in overall management of TC's training function so as to

avoid overlap in responsibilities as well as to ensure that identified training needs are legitimate and met in the most cost-effective manner.

5. Substantially increase TC's reliance on external training by contracting out with local colleges and universities, equipment manufacturers, etc., for both technical and management training where this technique is cost-effective.

6. Undertake an assessment of all training activities across the Public Service (through the formation of another study team) with a view to achieving improved cost effectiveness in the management of training facilities and activities in all federal departments. This study team should consider the merits, inter alia, of external contracting, and the possible savings from inter-departmental rationalization. The study team could also consider the potential of technology such as computer aided learning to reduce costs, particularly travel expenses.

AVIATION STATISTICS

DESCRIPTION

Aviation Statistics Centre (ASC)is the major focus of activity for the production of aviation statistics within the federal government. It produces, publishes and disseminates data describing the operation of Canadian air carriers, activity at Canadian airports, the movement of aircraft passengers and cargo between Canadian points and between Canadian and foreign points, and the overall characteristics of the Canadian aviation industry.

AUTHORITY

Air Carrier Regulations (Part VIII, Section 10) pursuant to Part II of the Aeronautics Act.

OBJECTIVES

To collect and publish data used by the Canadian Transport Commission (CTC) and Transport Canada (TC) in their regulatory functions; by Statistics Canada (SC) for the System of National Accounts; and by the industry and the interested public.

BENEFICIARIES

Federal departments and agencies, the airline industry and the interested public benefit from data about air travel.

EXPENDITURES (85/86)

($000)	ASC[1]	ASRP[2]	TOTAL
CAP	-	-	-
O&M	2,525	1,225	3,750[3]
Transfers	-	-	-
Total	2,525	1,225	3,750[3]
Revenue	25	-	25
Net Cost	2,500	1,225	3,725[3]
Person-years	41	27	68[3]

[1] Ongoing ASC activities

2 Aviation Statistics Redevelopment Project (ASRP) (See Annex A for a description of activities) has a current TEC of $4.5 million of which an estimated $3 million has been spent.

3 Does not include resources consumed by Transport Canada for data processing.

Notes: SC, TC and the CTC each contribute to this program.

SC is implementing full cost recovery for its publications in 1985/86, which is expected to generate about $27,000 in revenues from aviation publications in 1985/86. Neither the costs nor revenues for these publications are shown here, however, as these are subsumed in the budget of the publications division of SC.

The revenues shown of $25,000 are from producing tailor-made tabulations of aviation data for clients in the federal and provincial governments and industry.

The ASRP is now expected to be completed in 1987/88.

OBSERVATIONS

Under the present regime, aviation data are collected to serve three purposes: for the System of National Accounts maintained by SC, for which 25 to 30 per cent of the data now collected are essential; in support of the economic regulatory activities of the CTC; and in aid of the safety and technical regulation performed by TC. Apparently, the ongoing data requirements for the System of National Accounts have not been examined to see what collection of these data would provide for other purposes.

Although data needs in the deregulated environment envisaged by Freedom to Move are unclear, there is consensus that less data collection will be required. Nonetheless, the government will still need some information base to help guide policy.

The department sees its future information needs in support of its operational responsibility as primarily safety-related. At least some of these needs can continue to be met by internal data-gathering mechanisms (e.g.

airport tower control reports on aircraft movements), as opposed to industry reports.

The department is considering a centralized, multi-modal consolidation of data-gathering activities.

Industry suspects needless duplication, e.g. Transport's stated interest in O&D data for monitoring activity levels at individual sites could at least partly be met by the airport tower control reports already collected within the department.

Industry finds only a small portion of the current ASC data useful. Even the useful information, however, is seen to have important drawbacks: for example, the passenger origin and destination data is an incomplete indicator of travel patterns and is increasingly unhelpful as Level III carriers (which do not report these data) increase their market share. ASC reports generally are not available on a timely basis. Part of this problem stems from the fact that ASC staff spend a significant amount of time coaxing carriers to submit their reports.

There is apparently no ongoing, formal consultation with industry. Industry finds the costs of filing data considerable, particularly for data other than those which are routinely produced as part of a company's standard operating practices. Moreover, it is industry's view that the financial data requirements are too detailed and too frequent.

In 1982, industry submitted a statement of principles to guide the collection of data (Annex B) as part of the consultative process for the ASRP.

On the matter of whether whatever data might be collected in a deregulated environment should be publicly distributed, as in the U.S., industry's view is that confidentiality of disaggregated data should still be protected; otherwise carriers' commercial interests, as well as their reporting habits, would suffer. Industry also pointed out that there are other effective avenues open to carriers and/or government to satisfy their data needs: shared computer networks, private surveys, industry magazines, etc. Statistics Canada has its own safeguards for protecting commercial confidentiality while meeting public information needs. At the same time, it should be noted that currently the ASC has an agreement between

Level I carriers* to circulate among them the disaggregated (and otherwise confidential) data they submit individually.

The ASRP, now due to finish in 1987/88, has proven to be a lengthy and expensive process. It also appears anachronistic in the light of the major changes to regulation envisaged in Freedom to Move.

The ASC has occasionally resorted to private sector contracts for certain phases of redevelopment projects, once it has defined the project focus in the preliminary phases.

The potential impact of a change in airport management structure on data needs and responsibilities has not been examined.

KEY ISSUES

What data would be needed by government in a deregulated environment? Of these, what portion could be obtained by methods other than imposing industry reporting requirements (e.g. from System of National Accounts Data, existing departmental reports, contract surveys)?

In a regulatory environment premised on market forces and open access, what justification is there for the federal government to collect data which it keeps confidential?

Should the Aviation Statistics Redevelopment Project, as well as the regular ongoing ASC activities, carry on business as usual if the regulatory environment on which they are premised is being fundamentally changed?

Does the program produce benefits to government and/or industry that are commensurate with the significant level of resources consumed?

Should industry be compensated for having to produce data needed solely or largely for internal departmental requirements?

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* (Air Canada, CP Air, PWA, Nordair, Quebecair, Eastern Provincial)

ASSESSMENT

In the regulatory environment envisaged in Freedom to Move, the scope of this program should decrease dramatically. The present, detailed reporting requirements will not be needed, although some degree of information gathering, as yet undefined, will be required to meet safety regulation needs, and to keep the Minister of Transport informed of industry evolution. In these circumstances, the study team believes the Aviation Statistics Redevelopment Project seems unwarranted. Indeed, even for today's less regulated environment, the costs of the program under review seem excessive in relation to the benefits.

In the view of the study team there are multiple sources of data which could be tapped, other than industry reporting, but their potential contribution has not been vigorously pursued.

The study team believes industry should be compensated for having to supply data which is used only for intra-departmental purposes.

Statistics Canada has a continuing requirement to gather a certain portion (one-quarter to one-third) of existing data for the System of National Accounts it must maintain. It is not clear that any additional aviation data would be needed by government in a deregulated environment. Moreover, if additional data were required, these extra data could be gathered separately by either the department or the new regulatory agency, resorting to industry reporting requirements only after all other sources have been systematically exploited.

The study team is of the opinion that, in an economic regulatory environment premised on market forces and open access, data gathered by government, other than for the System of National Accounts, should be publicly available unless an unassailable case can be made for not doing so.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Terminate the Aviation Statistics Redevelopment Project immediately.

2. Reduce the burden on industry by reducing the amount of aviation data required to be submitted by air carriers, consistent with the regulatory needs of the new Canadian Air Policy (May 1984) and in accordance with the principles set out in option 5.

3. Reduce the ongoing ASC resources by 25 per cent commencing in 1986/87.

4. The aviation data essential for the System of National Accounts should be collected under the legislative authority of Statistics Canada and be made available to Transport Canada in a manner to be negotiated.

5. The need, if it exists, and the responsibility for gathering any aviation industry data additional to that essential for the System of National Accounts should be defined in the proposed new transportation legislation envisaged in Freedom to Move, to allow for public discussion on the scope for any burden on industry in a deregulated environment and how it could best be administered. If the legislation as finalized does call for additional aviation data to be collected, the following principles should apply to such collection:

    a. Tap existing internal sources (e.g. airport tower reports, output from the flight data improvement project) before imposing extra reporting requirements on industry.

    b. Exploit the possibility of contracting with the private sector to meet specific information needs (e.g. traveller surveys) before imposing extra reporting requirements on industry.

    c. Systematically consult with industry at regular intervals on the subject of data needs. The list of principles proposed in this regard by the Air Transport Association of Canada in 1982 would be an appropriate point of departure (See Annex B).

    d. Industry should be able to recover its costs for data it must produce which are for intra-departmental use only.

    e. The justification for collecting additional industry data should be reviewed periodically, e.g. every two years.

f. Consistent with the philosophy of a deregulated environment, data collected other than for the System of National Accounts should be publicly disseminated, unless it can be demonstrated on a case-by-case basis that confidentiality is essential. Moreover, any government agency collecting aviation data should not provide private clearinghouse services for a select group of carriers (e.g. by circulating on their behalf individually-submitted and otherwise confidential data among the group).

6. If, as envisaged by the Freedom to Move, the functions of the regulatory agency are fundamentally changed, the Aviation Statistics Centre should be disbanded.

DESCRIPTION OF AVIATION STATISTICS REDEVELOPMENT PROJECT

PROJECT: CHARTER ON-FLIGHT ORIGIN AND DEVELOPMENT (OFOD)

The charter OFOD redevelopment project was generated by the decision to combine the international and domestic questionnaires into a new Statement No. 2 which will facilitate the carriers' use of the on-flight origin and destination concept (i.e. reporting all flight segments).

The survey system that is implemented through this redevelopment will reduce the response burden on the carriers, provide more accurate and timely data, provide arrival and departure times for charter flights, make more information available about charter operations and make access to the data easier for the major users: Transport Canada, the Canadian Transport Commission and Statistics Canada.

Status

To be implemented during the last half of 1985/86, with post-implementation adjustments scheduled for the first half of 1986/87.

PROJECT: AIRPORT ACTIVITY - MAIN SYSTEM AND SUB-SYSTEMS

The Airport Activities Report is concerned with passenger, mail and cargo traffic at Canadian airports. A system is required which can process in the absence of data elements no longer collected as well as the new data elements introduced by new Statement 6 (I,F). There are various other requirements, including the need to make changes to output reports generated by the Transport Canada Sub-systems to ensure capability. Sub-systems include: (i) quarterly and annual detailed analyses of traffic flow data by airport; and (ii) annual summaries of airport activity.

Status

Post-implementation adjustments scheduled for the second half of 1985/86.

PROJECT: REDESIGN OF THE CYCLOPEDIA PARAMETER FILES (CPF)

Summary

The main purpose of the CPF is to assist in the validation of raw data entering various systems.

Status

Post-implementation adjustments to be completed by early 1986/87.

INDUSTRY PRINCIPLES FOR SUPPLY OF STATISTICS

1. Carriers need to understand end uses and benefits in order to justify cost burden.
2. Carriers must reduce cost burden since financial viability threatened by uncontrollable increases in major cost elements.
3. All government statistical reporting requirements be included in one package.
4. Carriers oppose the creation of data for regulatory purposes.
5. "ONE FILE - ALL FILE"
6. Confidentiality - avoid competitive advantage for foreign carriers.
7. Carriers will support and maintain agreed package of statistical reporting for the 80s.

Source: Air Transport Association of Canada

PILOTAGE

DESCRIPTION

There are four Pilotage Authorities, all of which are C-1 Crown corporations, to ensure the safe and orderly passage of ships in waters designated as compulsory pilotage waters.

AUTHORITY

The Pilotage Act and associated schedules.

OBJECTIVES

The objectives of the Pilotage Authorities are:

a. To establish, operate, maintain and administer, in the interest of safety, an efficient pilotage service within their respective regions.

b. To prescribe tariffs of pilotage charges that are fair and reasonable, and that provide revenue sufficient to permit each authority to be financially self-sustaining.

BENEFICIARIES

Shipping companies, ship operators, ships' masters and crew all benefit from the availability and use of pilots. Marine safety is enhanced, and the risk of accidents and damage to waterway, marine, and public property is reduced.

EXPENDITURES (84/85)	**($000)**	
O&M	252	(Estimated)
Transfer	2,248	
Total	2,500	
Revenue	-	
Net Cost	2,500	
Person-years	4	

Notes: The four person-years belong to Transport Canada (TC), and provide policy advice and liaison on marine pilotage.

The transfer payment is the financial support to the Pilotage Authorities for operating losses. In 1984/85, the bulk of this went to the Laurentian Pilotage Authority (LPA).

OBSERVATIONS

Pilotage is the conduct of a ship by a properly qualified deck watch officer who has adequate local knowledge of the waters through which the ship is being sailed. There is wide agreement on the necessity of pilotage as defined above.

The average level of incident-free pilotage assignments in 1983 ranged from 99.3 per cent to 99.8 per cent among the authorities.

The Pilotage Act defines "compulsory pilotage" as "in respect of a ship, the requirement that the ship be under the conduct of a licensed pilot or the holder of a pilotage certificate".

Pilots are engaged either as employees of the Pilotage Authorities, or as members of various pilot corporations contracting with the Pilotage Authorities.

The Dominion Marine Association, and some ship owners, ships' officers and shippers contend that compulsory pilotage is unnecessary in Canada. They consider that the decision to engage the services of a pilot should be left to the owner of the ship or the master. It is their view that compulsory pilotage imposes wasteful costs on the shipping industry, and, by extension, on the shippers using the services. The vessel "Ferbec", operating in dedicated service between Havre, St. Pierre and Sorel, paid pilotage fees of $405,000 during 1984. By contrast, the total cost for the 30 crew members for the season totalled $925,000.

On the other hand, the Pilotage Authorities, some port operators, and representatives of foreign shipping interests contend that compulsory pilotage, in certain areas, is required for public safety and to protect the environment.

The Pacific Pilotage Authority (PPA) and the Great Lakes Pilotage Authority (GLPA) each grant waivers to vessels and masters on application and with the required proof of knowledge and experience of the deck watch officers in their pilotage areas (10 trips in three years). The LPA does not grant waivers.

Pilotage certificates are available through examination established by each Pilotage Authority and conducted by active pilots. Dominion Marine Association members contend that their masters are sufficiently capable and knowledgeable that the examination requirement is an insult. Moreover, the presence of active licensed pilots in the examination process is not conducive to awarding certificates. For example, the Atlantic Pilotage Authority has granted about 45 certificates by examination, while the LPA has granted none.

There are two circumstances in which a vessel is liable for pilotage fees even though a pilot is not on board the vessel. First it sometimes happens, generally at the end of the shipping season, that there is a shortage of pilots and two ships proceed in tandem through a compulsory pilotage area with only the lead ship having a pilot. Second, it sometimes happens that a ship cannot be boarded by a pilot because of poor weather but the ship proceeds through a compulsory pilotage area under the direction of a knowledgeable master. In both circumstances, pilotage fees are collected as if a pilot had been on board.

It is a widely-held view that pilotage tariffs should be negotiated with the affected industry. The Canadian Transport Commission's tariff appeal hearings are expensive and the costs to both sides in the dispute are a charge on the shipping industry and shippers.

Active licensed pilots serve as members of the board of each of the Pilotage Authorities. Conflicts of interest do, therefore, occur.

With the exception of the PPA, the productivity of pilots appears low.

It is a common belief that pilots' compensation is excessive for the work performed and that at only $1,000 the limit on the liability of a pilot is too low.

KEY ISSUES

Should pilotage be mandatory in Canada?

Should pilotage costs be subsidized by government?

How can costs to industry be controlled?

Is the administrative apparatus appropriate?

ASSESSMENT

Although the expenditures of TC in pilotage are not great, the cost to the industry of the four Pilotage Authorities, exceeds $50 million per year. Any lowering of these costs will be to the benefit of Canada in decreasing the costs of Canadian goods in domestic and foreign markets. The reduction in the costs of pilotage, however, must not be at the expense of an unacceptable risk to life, property, or the environment from misadventure involving a ship.

With the exception of the LPA, the study team has concluded that the system established under the Pilotage Act has evolved into one which, while not perfect, protects the environment, serves the needs of industry, provides for local decision-making, is close to recovering its own costs, and shows signs of sufficient maturity to solve many of its problems.

This contrasts with the view of the Regulatory Study Team which observed that many of the services provided by the pilots across the country are not required, proposing instead, privatization of pilotage services.

The current CTC hearing into the tariff of the LPA along with the attendant exhibits should form the basis of an examination of the operation of that authority, with emphasis on business practice and the efficiency of operation, particularly concerning the adjustment of the numbers of pilots utilized to reflect reductions in traffic volumes.

The study team believes that while there should continue to be areas of compulsory pilotage in Canada, each Pilotage Authority should examine its region at regular intervals to ensure that the justification for the compulsory areas remains valid. In addition, the conditions for waiver and for certification of mariners should similarly be regularly examined to ensure that they remain appropriate. For example, the granting of waivers by the GLPA after 10 trips in three years appears appropriate, whereas the LPA does not grant waivers, insisting on the use of licensed pilots or holders of pilotage certificates.

The Regulatory Study Team proposed that masters and officers be encouraged to submit to the examinations required for certification as pilots. They also considered that the Pilotage Act should be changed to provide exemptions for qualified masters and deck watch officers. It is the study team's view that the present act permits the granting of such exemptions.

In the view of the study team, the charging of full pilotage fees when ships do not have a pilot on board is inequitable. Provision should be made in the Pilotage Act for a reduced fee or a nil fee depending upon circumstances. It should be clear that the study team is not proposing against appropriate penalties being applied in the case of an illegal act, but that where circumstances dictate, the pilotage fee should be adjusted.

In the view of the study team, the limitation of a pilot's personal liability to $1,000 in the act is an appropriate level since this minimizes the cost of providing pilotage services and allows the vessel owner to obtain the necessary liability insurance at the lowest cost. Credibility of the pilots' credentials requires, however, that the sanctions applied to pilots in the event of accidents for which they share responsibility should be appropriate to the circumstances.

The Regulatory Study Team suggested enhancing personal liability for pilots.

The study team is of the view that each authority should be required to include in its Annual Report to the Minister measures it has taken to ensure that pilot productivity, compensation, and tariffs are maintained at the levels necessary to provide the industry with the service it requires at the least cost, and this cost should be recovered from the industry.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Restructure all Pilotage Authorities to eliminate conflict of interest, and to make them more accountable and responsive to the shipping industry and the public served by ensuring that active pilots not conduct the examination of masters or deck watch officers for

pilotage certificates, and that active pilots not be members of the Board of a Pilotage Authority.

2. Following the report of the Canadian Transport Commission on the current tariff appeal, amend compulsory pilotage areas and the waiver regulations of the Laurentian Pilotage Authority so as to meet industry requirements while maintaining vessel safety and environmental protection.

3. Introduce legislation to amend Sections 33 and 34 of the Pilotage Act to permit discretion in the levying of pilotage fees for a vessel that operates legally through a compulsory pilotage area without a licensed pilot or the holder of a pilotage certificate on board.

SEALIFT

DESCRIPTION

The Coast Guard is responsible for the coordination of the eastern arctic sealift operation (except for the Keewatin region, which is the responsibility of Northern Transportation Company Ltd.) on behalf of the federal, provincial, and Northwest Territories governments, the United States Air Force, and commercial and private shippers.

AUTHORITY

Main Estimates

OBJECTIVES

The effective and efficient operation of northern resupply in the eastern arctic.

BENEFICIARIES

Shippers, northern communities, commercial and military locations - assured deliveries of supplies and equipment.

Shipping Companies - provision of a framework within which shipping companies can provide efficient services.

EXPENDITURES (84/85)	**($000)**
CAP	-
O&M	7,513
Transfers	-
Total	7,513
Revenue	6,722
Net Cost	791
% Cost Recovery	89
Person-years	10

Note: On occasion, Canadian Coast Guard vessels will deliver cargo to northern settlements when conditions do not permit commercial vessels to do so.

OBSERVATIONS

Sealift is the least costly approach to resupply of northern communities.

Approximately 80 per cent of cargo requirements are generated by the Government of the Northwest Territories.

Coordination of sealift activities is required to provide shippers, consignees and the shipping industry with a framework for resupply of northern communities.

The responsibility to act as a coordinating agency was given to Transport Canada (TC) through a policy decision of an interdepartmental committee, including TC, Supply and Services (DSS), Indian Affairs and Northern Development, Treasury Board Canada and the Government of the Northwest Territories. There is no evidence that current conditions would alter this decision.

The division of the eastern arctic into separate tendering areas results in a number of companies participating in the northern sealift.

Transport Canada is in the process of requesting from Treasury Board another 5-year extension of its current mandate which expires in 1987. A condition in the current mandate that will be retained in the proposed extension permits the Government of the Northwest Territories to make a proposal at anytime for an appropriate Inuit organization to assume this coordination role.

KEY ISSUES

Should the federal government be involved in this activity?

Should the federal government recover its costs for this activity?

Could changes be made to improve the efficiency of the resupply system?

ASSESSMENT

There is an ongoing requirement for sealift coordination to ensure the most cost-effective resupply of northern communities. Given the competitive commercial implications of northern resupply, an agency which can select the best service at lowest cost should coordinate this function. Because Transport Canada can coordinate the activities of its icebreakers with commercial resupply vessels, it is the appropriate federal agency for this task the study team believes.

The delegation of this coordinating function to a native organization would be appropriate the study team believes, so long as the cost-effectiveness of the resupply operation is not impaired.

Contracting practices are designed to ensure that a number of shipping companies participate in the resupply rather than to provide for the most cost-effective transportation of goods. This approach precludes the possibility of more cost-efficient resupply by one company or a smaller number of companies with larger contracts.

Total federal costs should be recovered for this activity.

OPTIONS

The study team tecommends to the Task Force that the government consider the following:

1. Amend Transport Canada's contracting process to ensure that there are no restrictions on the ability of commercial firms to tender for all or part of the cargo delivery.

2. Fully recover the costs of Transport Canada's involvement in the sealift.

3. Explore ways of encouraging and developing the capabilities of an appropriate native organization to take over the coordination of the sealift.

4. Permit a competent native organization to assume the resupply coordiration function upon receipt of a suitable proposal.

EMR SMALL PROJECTS FUND - TRANSPORTATION

DESCRIPTION

The Energy, Mines and Resources (EMR) Small Projects Fund -- Urban Energy Transportation and Industrial Sector -- is used to promote a number of energy conservation initiatives which flow from the National Energy Policy (NEP) through demonstration projects, promotion and information transfer.

AUTHORITY

National Energy Policy initiatives under the Small Projects Fund were approved by Treasury Board on May 21, 1981 (T.B. 777384) for a five-year period ending in 1985/86.

OBJECTIVES

To support, improve, facilitate and promote energy conservation in segments of the transportation sector through a variety of means such as demonstration projects, information transfer, promotional material, workshops, seminars and studies.

To achieve energy conservation objectives through joint cooperative undertakings with other levels of government, transit commissions, associations, private sector firms and members of the public including volunteers.

BENEFICIARIES

Commuters - appreciation for the ride-sharing concept as a mode of commuting.

Truckers - access to information on conservation and petroleum substitution.

Drivers - increased awareness of energy saving opportunities, fuel cost savings.

EXPENDITURES (84/85)	**($000)**
CAP	-
O&M	147
Transfer	235
Total	382
Revenue	-
Net Cost	382
Person-years	1

Note: In 1985/86, the last year of the projects, expenditures are of the same order of magnitude. For 1986/87, transfer funding of about $100,000 is planned as a result of delays in initiating the Truck Energy Conservation project.

OBSERVATIONS

The federal government is accountable for ensuring that the future fuel energy needs of the country are satisfied either through exploration or through energy conservation.

As about 60 per cent of petroleum fuels are consumed in urban areas, these constitute logical targets for energy conservation initiatives.

The majority of activities under this program are in the form of federal funding to local initiatives in urban areas.

There are other participants in some initiatives. For instance, the Ride Sharing Project in Quebec is jointly funded with the provincial government and ESSO. Toyota and Chrysler provide free vans to Association Covoiturage Québec Inc. (ACQ) for use by commuter groups. As many as 15 vanpools and 1,200 carpools are expected to be operating in Quebec in 1985/86 as a direct result of the efforts of ACQ.

Workable patterns/models for ride sharing have now been well established and documented as a result of the demonstration project in Quebec.

Demands for federal funding for ride-sharing centres in other parts of the country are likely to become more pressing and/or grow in the foreseeable future.

The truck demonstration project in Manitoba is in its initial launching phase.

This project is also a joint undertaking with the provincial government, the Manitoba Trucking Association and a number of large and small trucking firms.

As part of the project, U.S.-based experience will be transferred to Canada.

The Canada Post Corporation has extensively studied and experimented with motor fuel economy given its large fleet of trucks and vans, but findings have only reached a limited audience as they are available only through papers to learned societies.

Through its setting of standards and its monitoring of new car fuel consumption, as well as through its publication of the "Fuel Consumption Guide", Transport Canada is also involved in energy conservation.

While acknowledged to be in need of some updating, EMR has published, since 1977, "The Car Economy Book: How to Buy, Drive and Maintain Your Car to Save Energy and Money".

KEY ISSUES

Is continued federal involvement in energy conservation initiatives such as the Ride Sharing and Truck Energy Conservation projects warranted?

Should there be inter-departmental streamlining of information activities?

ASSESSMENT

In pursuing the objective of energy self-sufficiency, the federal government is justified in being concerned with energy conservation, including transportation in urban areas. At issue is the form/nature of federal involvement in this domain.

Consumers of petroleum energy have a self-interest in being energy conscious, if only to limit their personal expenditures.

While the federal government can play a useful role in disseminating information on energy conservation in transportation, the need and the advisability of its involvement (direct or indirect through funding) in particular demonstration projects is doubtful, at best.

When related to their particular responsibilities, needs or priorities, federal departments and agencies can usefully engage in energy conservation projects (e.g. Canada Post Corporation). However, the results would be of greater benefit if disseminated in a systematic fashion.

For ongoing projects (such as the Ride Sharing project) the study team is of the view that the federal government should immediately terminate its participation and focus its future efforts in this area exclusively on information dissemination. For example, rather than direct funding, the federal involvement in the truck demonstration project in Manitoba could be limited to distributing relevant information already available in federal departments and agencies (e.g. Canada Post Corporation).

Duplication of activities between EMR and other departments including Transport Canada (e.g. publications promoting energy conservation, such as the Fuel Consumption Guide) need to be eliminated. In the view of the study team, given its mandate, EMR is best suited to play a lead role in coordinating federal energy conservation activities in transportation.

OPTIONS

The study team recommends to the Task Force that the government consider the following:

1. Immediately cease publication of the "Fuel Consumption Guide" of Transport Canada.
2. Terminate EMR's financial participation in projects such as the Ride Sharing Project in Quebec and the Truck Demonstration Project in Manitoba and restrict the use of the Small Projects Fund - Transportation to information dissemination.

PART III: RELATED POLICY AND PROGRAM ISSUES

REGULATORY REFORM - FREEDOM TO MOVE

The comments and conclusions in this section of the report are the collective views of the study team only because the team did not believe it would be appropriate or helpful to undertake interviews so as to obtain the comments of others on the Minister of Transport's proposals for regulatory reform. The team made this decision based on a number of considerations. The study team's mandate was to address the delivery of transportation programs in the federal government and although there are instances when program delivery and policy are so interconnected that it is not useful to comment on one without reference to the other, the study team recognized that Freedom to Move was more in the nature of a framework rather than a blueprint, and thus the program delivery aspects were clearly subordinate to the principles.

The minister's office and Transport Canada had solicited or were in the process of soliciting the views of a large number of private sector interests. In addition, the Ministerial Task Force on Program Review had directed the Study Team on Regulation to consult with the provinces on regulatory matters generally.

Finally, it was known that a special study team had been set up to report to the Chairman of the Task Force on the relationship between the federal government and regulatory agencies.

Despite not obtaining outside input, the study team thought that ministers would be interested in its views because, although it is a rather small sample in numbers, the comments are based on breadth of experience, with representation from all modes and many facets of the transportation community.

Generally, the study team is of the view that Freedom to Move is a strong and coherent statement of principles and proposals aimed at a more market-driven transportation system where the forces of entrepreneurial initiative and competition are to be allowed to operate more freely in the expectation that this will lead to a more efficient system offering services at lower cost.

These objectives and the approach to their realization seem appropriate for the "mature" parts of the transportation system where there is sufficient traffic density for competitive forces to gain their achievement. There are many parts of Canada, however, in which the transportation system is still "developing" and where the long distances and low traffic volumes may be insufficient to support commercially viable services or an adequate level of competition to ensure reasonable service levels and pricing. Freedom to Move acknowledges this but proposes to deal with it by broad deregulation to see if commercially viable services will be made available and, if not, to provide subsidized services by calling tenders. A number of significant problems could arise in executing this approach that would likely be most acute in the less densely populated regions of the country.

Another concern in this respect is the potential for the reduction or elimination of cross-subsidization from more profitable to less profitable routes by virtue of increased competition. While extreme cases of cross-subsidization may lay an unfair price burden on users of the more profitable routes, a more moderate level of cross-subsidization is reasonable since the less profitable route often is a feeder route which helps to make the more profitable route viable. If the less profitable routes are to receive no cross-subsidization, the logical result will be that, if they are not commercially viable, they will require higher public subsidies than is now the case to keep them in operation because the user-pay contribution from users of the more profitable route will have been lost.

In a period of fiscal restraint, this could well mean that many of the less profitable routes will receive no subsidy at all and will have to be dropped. To the extent that such cases may occur, the study team is of the view that it would be better to retain a measure of cross-subsidization such that the less profitable route could continue to exist through a form, albeit somewhat imperfect, of user-pay.

There is also some concern about the degree of correlation between reduced economic regulation and competition. This concern is intensified by the lack of specificity in Freedom to Move on the role of the major transportation crown corporations: Air Canada, CNR and its trucking subsidiary (CN Route), and CN Marine. The impact these companies have on the viability of commercial operations by private carriers should not, and must not, be underestimated. This brief commentary is not the place to go into detail on their financial performance or their management capability. Suffice it to say that private industry could not operate as they do.

It is not simply a question of their commercial viability, because the way in which they have been directed by the government or have chosen to operate has had, and will have, a very decided impact on the market. In fact, in some modes on some routes, these crown corporations have the capacity to eliminate competition through their ability to absorb losses. Put another way, a crown corporation that purports to be a commercial operation but that is not governed by the bottom line is not a commercialized operation in any sense of the word.

A further major concern of the study team relates to the weakness of the provisions to protect against foreign ownership. The proposed reform provisions would place reliance solely on the Investment Canada Act, but this act provides that all transactions under $5 million are excluded from review. This is potentially serious for the air carrier and trucking industries because it provides a means by which a foreign entity could control a major domestic service.

For example, a foreign company could acquire 100 per cent of a small Canadian air carrier for less that $5 million, and subsequently expand the operations of that carrier in a deregulated environment to be national or perhaps international in scope, subject only to obtaining an operating certificate and adequate insurance coverage. Both the foreign control provisions and the $20 million threshold respecting Notices of Transactions would be circumvented and Canada could be faced with foreign ownership situations against the national interest. Similar scenarios could evolve in the trucking industry.

It seems to the study team that the government should give special consideration to the need for continuing restrictions on foreign ownership. Incidentally, at least insofar as air carriers are concerned, such restrictions would be consistent with policies of other governments. The U.S. restricts foreign ownership to 20 per cent of all voting shares of a U.S. carrier, and the U.K. will not allow foreigners to control U.K. airlines, although the Secretary of State may allow exemptions.

Another major concern of the study team is the question of monopolies such as the St. Lawrence Seaway Authority and airports. With entities of these types, it will be necessary for the government to set specific standards of expense and income, otherwise more of the former will necessitate more of the latter to the detriment of an efficient transportation system.

Finally, in the view of the study team, failure to include rail passenger services and VIA Rail is a significant omission as is the exclusion of grain transportation. VIA Rail is in direct competition with other public modes of transportation and is presently a very substantial drain on the federal treasury. It seems to the study team that a statement of national transportation policy must include reference to the role of passenger rail service in meeting the transportation needs of Canada in a competitive environment.

The study team's work has resulted in a number of programs being intensely scrutinized. As a result of the perspective gained through this scrutiny, the study team wishes to comment on the fact that grain transportation is specifically excluded. Indeed, one cannot help but be struck by the advantages that application of the principles stated in Freedom to Move would have in this important area. There are a relatively small number of measures that could be taken, which would be in complete accord with the principles of Freedom to Move, to assist the evolution of the western Canadian grain transportation/handling system to become more market-driven and efficient, thereby enhancing our ability to compete in a very competitive world market for grains and increasing the overall return to Canadian producers. These include action to allow branchline abandonment and discounted rail rates where they make economic sense, to encourage incentive freight rates, and to implement the recommendation of the Committee of Enquiry into Method of Payment with respect to the "pay the producer" option.

The study team also has heard some concern expressed about the consultative process, particularly with provincial governments. While the exercise of engaging in meaningful consultation is a time-consuming process, it must be acknowledged that authority in the transportation field is shared between the federal government and provincial governments. The evolution towards a less-regulated and more market-driven transportation system will, in a number of instances, require close consultation between the two levels of government. While Freedom to Move welcomes public response and refers to cooperation among the federal and provincial Ministers of Transport regarding extraprovincial trucking, it does not comment on mechanisms for federal/provincial consultation or, indeed, for broader consultation which will be very important if the evolution is to proceed without major difficulties.

The following provides comments by mode of transportation.

RAIL

In the view of the study team, Freedom to Move appears to have two fundamental inconsistencies in its treatment of the rail mode.

First, it purports to rely on competition and market forces to yield lower prices and better services to shippers and yet provides for increased government intervention. Shippers that are captive to one rail line will have access to competing railways through the imposition of a legislated rate to the point of interchange. This is a completely new statutory provision. However, it fails to recognize intermodal competition and, depending on the level of the legislated rate, it could result in serious revenue attrition for Canadian railways.

At present, one railway can seek CTC approval to obtain running rights over another. Freedom to Move proposes to allow the Governor-in-Council (not the regulatory agency) to force two unwilling railways to share tracks, at a level of compensation to be determined. If this provision is necessary, the compensation should be specified to be at commercial levels.

Section 255 of the Railway Act is to be amended to give the Minister new powers to order certain actions and expenditures by the railways. There is no mention of compensation but clearly this too should be at commercial levels.

In respect of compensation for uneconomic branch lines, it would appear that this will be at the discretion of the minister, rather than established by legislation. It seems to the study team that reference should be made to full compensation as this would be in the nature of an imposed public duty.

In the view of the study team, the second inconsistency in Freedom to Move is that it promotes unrestrained intramodal rail competition without addressing the fact that the railway industry in Canada is dominated by two carriers, one of which is a crown corporation (that has 60 per cent of the combined revenues and 57 per cent of the combined revenue-tonne kilometres) and is not subject to the same market discipline as its private sector competitor.

Two key programs which currently help to balance this inequity would disappear. Section 276 of the Railway Act would be repealed. Removing this statutory requirement could eliminate a major check on any tendency on the part of CN to move traffic at below compensatory rate levels.

Also, confidential contracts are to be permitted. Without the rate visibility that exists at present, CN would be more free to capture traffic at non-compensatory or barely compensatory levels, levels that could not be justified by prudent business practice. It is questionable whether the predatory pricing provisions of the Combines Investigation Act would provide an adequate substitute safeguard.

In the study team's view, both inconsistencies in Freedom to Move are of serious concern because they could result in downward pressure on revenues, without the ability to adjust costs. If the intent is to ensure an innovative, efficient, and competitive system, the railways will have to be able to generate adequate returns to attract the necessary investment.

From the shippers' viewpoint, because transportation services are a derived demand, shipper bargaining power is directly related to the extent to which a shipper is a price taker and a carrier is a price maker. A shipper who has a choice among and within modes clearly has more power than a shipper captive to one carrier.

Several proposals in Freedom to Move have the potential of increasing the bargaining power of shippers. For example, removing the ability of railways to price collectively means that, except for shippers now captive to one carrier, choices for shippers would be increased.

This raises a concern about the extent of the protective or appeal provisions for captive shippers. The present Section 278 of the Railway Act defines captivity in terms of captivity to the rail mode; the proposals in

Freedom to Move define captivity in terms of captivity to a single rail carrier. In contemplating the likely behaviour of a two-firm industry, there would be some value in considering the retention of the existing definition of captivity. This has particular relevance for shippers who have access to two rail carriers but are effectively captive to the rail mode for the movement of most of their traffic.

A related concern is the proposed group of dispute-resolving mechanisms. Any measure to speed up the Section 23 process once it is initiated is highly desirable but the process will likely always be costly and cumbersome. The proposal that specific recognition be granted to shippers captive to a single carrier leaves out shippers who are captive to the rail mode. The final offer arbitration proposal is an interesting one but the criticality of the observation, "the arbitrator be independent, impartial and experienced", should not, in the study team's view, be underestimated.

Perhaps a partial answer is to rescind Section 382 of the Railway Act to allow Canadian shippers full commercial freedom for moving goods between two points in Canada via the U.S. This would also provide Canadian shippers with the same opportunities as U.S. shippers in using each country's rail carriers to move goods to market. In addition, there appears to be merit in extending the four-mile (seven-kilometre) switching limit to 30 or 50 kilometres.

The proposals concerning running rights, interswitching and joint track use create new mechanisms which have the effect of expanding choices available to shippers in moving goods to market. These proposals appear to recognize the reality that an industry dominated by two firms does not tend to exhibit the kind of price competition which multifirm industries exhibit. The administration of these mechanisms may be difficult but their existence as competitive surrogates will likely affect the competitive behaviour of carriers.

The proposals concerning tariff records, minimum rate regulation and branchline abandonment point in the direction of lower costs or increased flexibility for rail carriers. This should in turn permit railways to offer lower cost or innovative arrangements to shippers. In the view of the study team there are other existing avenues to pursue in this area. For example, rail carriers are now subject to detailed safety regulation and operating rules. The study team has concluded in its assessment of the Surface Safety Regulation - Rail Program that new regulations should be developed based on performance specifications. Under this system, railways would be free to use whatever kind of equipment and management systems would allow them to meet the performance specifications enunciated by the regulatory authority. The bottom line should be a safe, more efficient operation.

MARINE

Although it would be generally helpful to make a clearer distinction between competition, negotiation and collusion this seems especially important in the marine mode. In the view of the study team it is not at all clear when the necessary arrangements between carriers (whether of the same or different modes) and shippers will be considered acceptable negotiation or unacceptable carrier collusion. Moreover, whereas intra-modal and inter-modal competition are to be encouraged, multi-modal competition is not mentioned although multi-modal service is seen as desirable. As all import and export shipments, together with much domestic and transborder traffic, move multi-modally, a consistent policy statement appears to be essential in the study team's view.

The statement about multi-modal rates reflects this lack of clarity. Shipping conferences are, by definition, a form of collusion between shipping lines; if they are to offer a through multi-modal rate, they will also have to come to some understanding with trucking and railway companies (or air cargo operators). This will likely require amending the "loyalty" clause in the Shipping Conferences Exemption Act.

With respect to the proposal to continue to restrict coasting trade to Canadian ships, this is in apparent contradiction to the general policy declaration of reducing regulation and increasing competition to promote greater efficiency. The study team suggests that the granting of waivers to allow the use of foreign vessels be liberalized to take into account the cost to the shipper, and that customs duties not be imposed on users of foreign ships permitted under waivers.

AIR

There is, in the view of the study team, widespread apprehension about the merits of moving to economic deregulation in the northern and remote areas of Canada. The markets in these areas are of low density and the current regulatory regime which allows controlled competition without subsidy based on the merit of each route application appears to be adequate and serves these regions well. In these sparsely populated areas, it is doubtful whether unlimited competition would be beneficial to the communities or resident consumers. It seems to the study team that it would be preferable to readjust the boundary line so as to place all of British Columbia and Alberta in southern Canada, and continue to regulate entry to, and exit from, scheduled air services in northern Canada for an interim period (for instance, four years as proposed in Freedom to Move generally). At the end of that time, if the evolution of the system gives some assurance of its ability to work in less densely populated areas without significant disruption in service to these areas or cost to the general taxpayer (through an unnecessary subsidy burden), then the government could complete the transition.

With regard to air carrier tariffs and pricing, the study team is in agreement with the principles stated. It should be noted, however, that the conditions of carriage should be published and available along with fares and tolls.

Finally, by way of comment, it should be recognized that there is a long history of "equity" i.e. distance-related economy fares, in the establishment of air fares and it will require considerable sensitivity and effective communications to offset this historic "right" which has much of its basis in the old Air Canada fare formula.

In summary, it is the study team's view that, overall, Freedom to Move is pointed in the right direction. The government should become more of a referee in transportation and less of a prime operator and should foster an atmosphere of free enterprise and competition. At the same time, the government must ensure that it does not simply replace one bureaucracy with another, or encourage significantly more costs in subsidies than is currently the case. Actions along the lines of Freedom to Move are necessary in the near future both to deal with the impact of deregulation in the

United States and to help Canada remain viable in increasingly competitive world markets for our products.

Perhaps the best way to summarize the study team's overall concern is to observe that the process of moving from fairly general statements of intent to actual legislative, organizational and regulatory changes is substantially more challenging than that of preparing the initial statement of intent. The success of the entire process will depend very much on the degree of realism and sensitivity to both economic and social realities that will guide the many detailed actions necessary to put the proposals into effect. The ramifications of the various specific changes will have to be thought through in detail before the changes are made, and consultation with relevant providers and users of transportation as well as other levels of government as appropriate will be necessary, both to keep the process realistic and to help ensure that those most affected by the changes understand the reasons for them and are prepared to support them to the necessary degree.

The enunciation of the proposed principles in Freedom to Move was an essential first step. In proceeding, it must be borne in mind that Canada's geography, economy and social fabric are very different from those of the United States and we will have to take our own approach in moving towards less regulation and a more market-driven transportation system. The study team hopes that the government and the minister will allow time for consultation and for the results of that consultation to be taken into account as the process evolves. Having said that, the study team would also encourage the government to pursue with vigour and reasonable alacrity a process that has been well begun.

PROGRAM DELIVERY MANAGEMENT ISSUES

There are a number of issues that have been raised frequently and forcefully by managers that have a major impact on the delivery of the federal government programs. These generally fall into two categories: impediments to good management, and to the timely formulation and promulgation of regulations.

MANAGEMENT

If the Federal Public Service is to have good managers, it is essential that authority be linked with accountability. This accountability include the prudent management of the resources entrusted to managers. At the same time, the study team has interviewed many managers who are totally frustrated with the lack of response to proposals they have made or that they have supported which have had the potential for significant improvement to the delivery or cost reduction of their program.

For example, proposals for cross utilization of personnel seem to them to be totally ignored, perhaps because the Treasury Board is the employer. Yet, the Treasury Board does not have the discipline of financial restraints to reinforce their resolve. Not only do changes to the system have to be made if the valuable input of line managers is to be utilized in improving the productivity of the federal public service, but also more effort needs to be devoted to encouraging employee and managerial productivity through the use of personal and program incentives. In particular, managers should be rewarded for dollar savings and person-year reductions, and not penalized by having their classifications unjustifiably downgraded.

The financial planning system places a very heavy burden on managers and results in the need for large resource commitments, not only in the financial planning branches but in the line branches as well. Moreover, there is little evidence or perception that the extensive documentation now required assists either senior managers or the government in taking rational decisions. It seems clear that the process of financial planning should be assessed with a view to balancing the legitimate data needs of the Treasury Board and other central agencies with the resources required to meet these needs, and the potential for improved results.

Despite efforts of the Office of the Comptroller General, current financial information systems are of limited value to Parliamentarians, the public and program reviewers. There is little relationship, for example, between the information displayed in Part III of the Main Estimates and the departmental Multi-Year Operational Plans (MYOP), at least insofar as Transport Canada is concerned. Simply put, the two documents are not reconcilable without additional documentation. The study team feels strongly that the financial information should be consolidated and displayed in a manner that will assist those interested in understanding what has been spent, what will be spent in the year corresponding to the Main Estimates, and what is likely to be spent in future years under the department's planning assumptions.

One of the most serious impediments to effective management by operational line and staff managers is the personnel management system. Action needs to be taken to change the role of classification and staffing personnel to assist managers in filling their needs as efficiently as possible, as opposed to simply stating requirements and monitoring compliance. In the case of classification, for example, this may require the division of staff into two groups - one to assist managers by writing position descriptions, and the other to act as advisors in the actual classification process.

Finally, the department must give careful consideration to the resources consumed in organizational changes, etc. that do not directly contribute to program output and limit these unproductive activities to the extent feasible.

REGULATORY PROCESS

There is a definite requirement to define and communicate to the industries and the public a process for the development of regulations that involves benefit/cost analysis, notice of the proposed regulation with the benefit/cost analysis, consultation with potentially affected parties, final determination of the need, and promulgation of the regulation. These various steps should all have specified time periods once notification of the draft regulation has been given.

There is an urgent need to clarify the role of legal advisors in the Privy Council Office conducting the review of proposed regulations for conformance with the Statutory

Instruments Act so as to prevent them from becoming engaged in drafting regulations. The current situation is unacceptable as the delays to the promulgation of regulations are excessive and the resultant additional costs unnecessarily burdensome to the industry. (See also overviews and program profiles for Economic and Safety Regulation.)

Finally, so as to assist the regulatory process, the study team suggests that more use should be made of non-adversarial public hearings to discuss substantive matters of general concern with interested and affected parties.

GENERAL

In today's environment, the study team believes that special attention must be focussed on the manner in which staff reductions are achieved. Never has the federal government had to cope with downsizing so many programs at the same time. Thus, the traditional tools are simply not adequate. Greater effort must be made to develop compensation packages, comparable to and consistent with those offered in the private sector and to employees of crown corporations, to facilitate the implementation of the difficult decisions inherent in this team's and in other teams' findings. Failure to do so will likely result in greater adverse reaction from many quarters. This reaction has the potential to weaken the government's resolve and reduce the possibility of meaningful improvements.

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Nasi, W.	Director General, Rail Economic Analysis	Canadian Transport Commission
Nemes, B.	Assistant Director, Transportation	Statistics Canada
Newton, W.	Director, Enforcement and Legislation	Transport Canada
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Nicholson, D.	Assistant Deputy Minister, Medical Services	Health and Welfare Canada
O'Neil, F.	Deputy Administrator, Air, Pacific Region	Transport Canada
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O'Reilley, P.	Traffic Manager	Federal Commerce & Navigation
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Obonsarvin, D.	Director General, Operations	Health and Welfare Canada
Oliphant, R.G.L.	Harbour Master	Port Corporation of Vancouver
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Ouellette, M.	Director of Engineering	Mack Trucks
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Parsons, N.R.	Administration Officer	Lloyds Register of Shipping
Patey, G.	Director	Labrador Airways
Paton, H.	Marketing Chairman, Airport Advisory Committee	Halifax Board of Trade
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Peiffer, K.	Executive Vice-President	Nordair
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Phillips, T.	Director, Costing Development	Canadian Pacific
Phillips, W.	Member	Toronto Board of Trade
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NAME	TITLE	AFFILIATION
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Vollmer, M.	Director of Technical Services	Allied Boating Association of Canada
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Wallace, J.	Manager, Transportation Sub-Agreements	Government of Manitoba
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Yeatman, M.	Member	Seafood Producers Association of Nova Scotia
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Zur, R.	President	Aztec Aviation